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*By H. S. Wadlin, Chief of Bureau*

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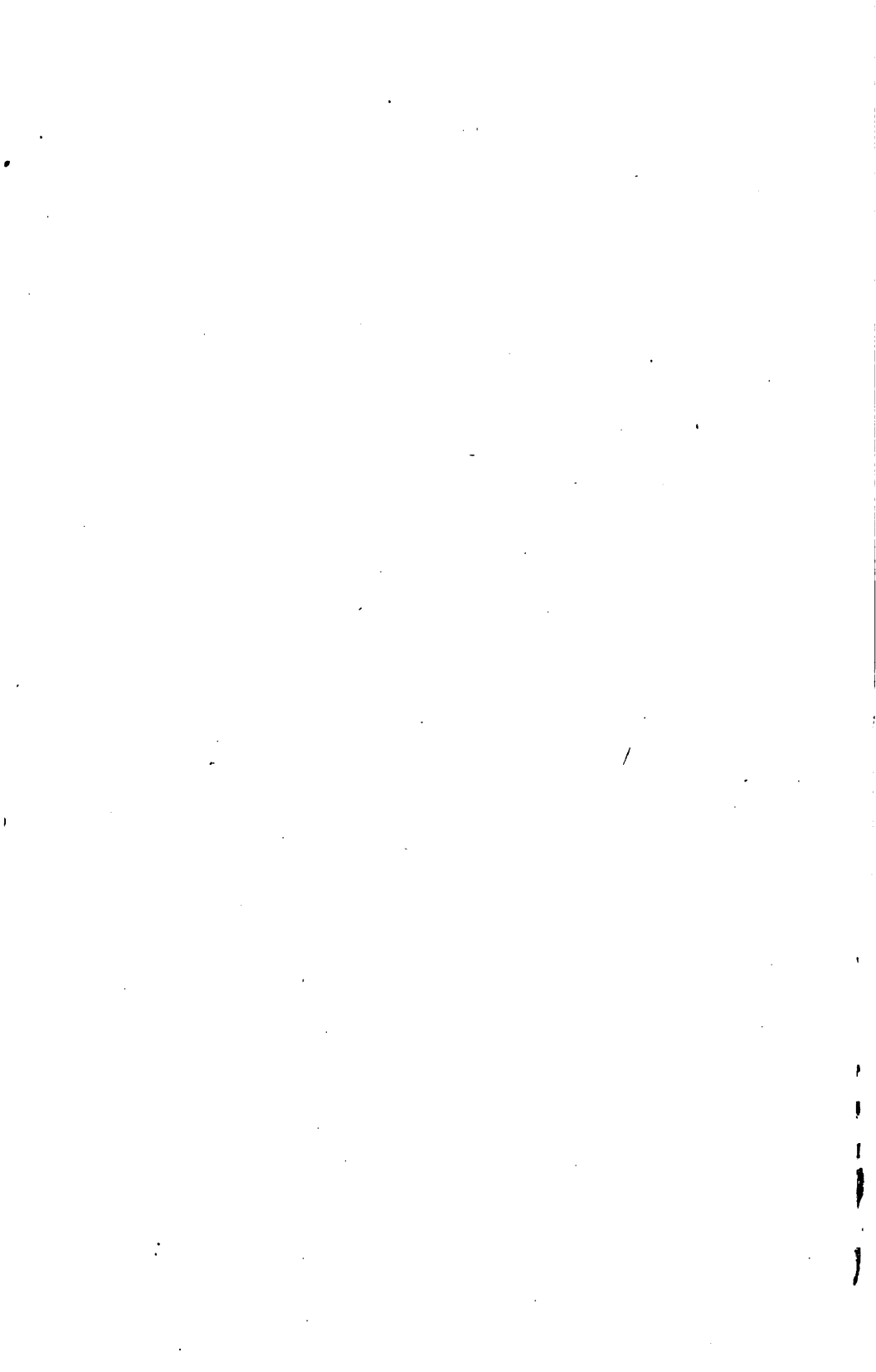
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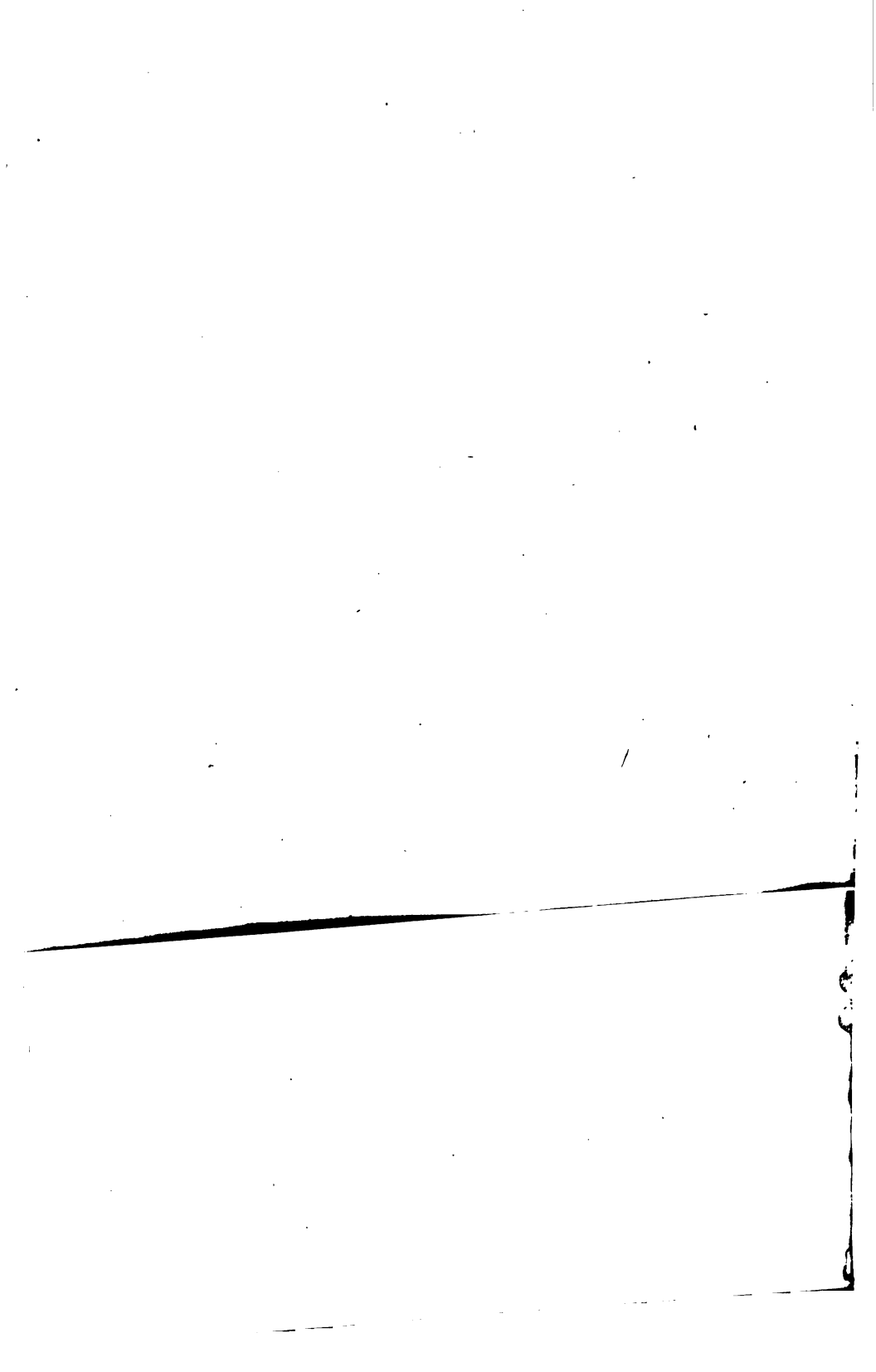
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THE  
ANNUAL STATISTICS  
OF  
MANUFACTURES.

1891.

*With compliments of  
Horace L. Madlin,*

*Chief of Bureau of Statistics of Labor.*



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THE

ANNUAL STATISTICS

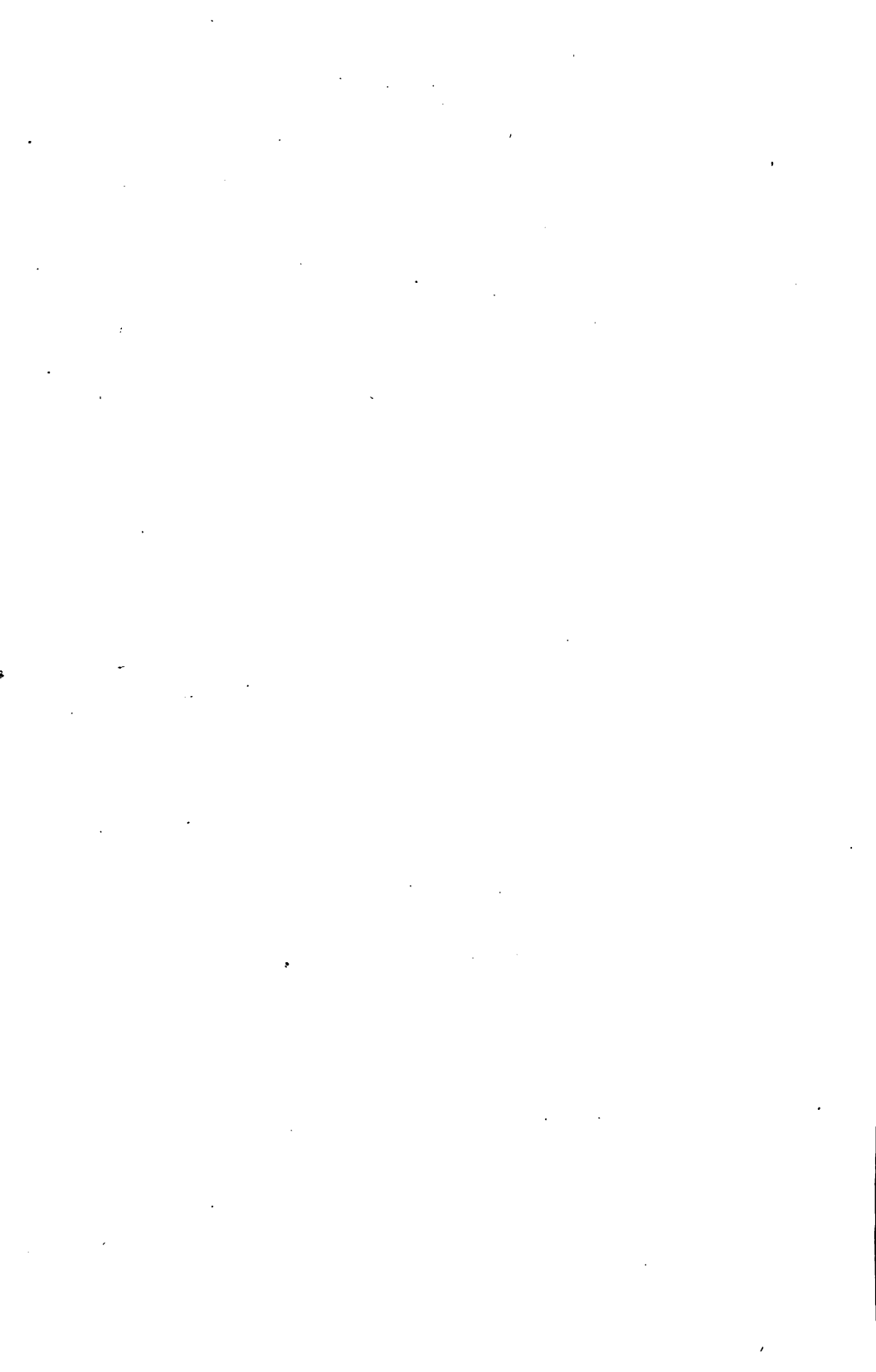
OF

MANUFACTURES.

1891.

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# Commonwealth of Massachusetts.

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BUREAU OF STATISTICS OF LABOR,  
CLAPLIN BUILDING, 20 BEACON STREET,  
BOSTON, August 1, 1892.

TO THE HONORABLE SENATE AND HOUSE OF REPRESENTATIVES: .

I have the honor to transmit, herewith, the Annual Statistics of Manufactures for the year 1891, which have been collected and are presented in compliance with Chapter 174, Acts of 1886.

Very respectfully,

HORACE G. WADLIN,

*Chief.*



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# THE ANNUAL STATISTICS OF MANUFACTURES. 1891.

## INTRODUCTION.

This volume is the sixth report on the Annual Statistics of Manufactures, issued in accordance with the provisions of Chapter 174 of the Acts of 1886.

The large number of returns received during the year enables comparisons to be made for the years 1891 and 1890 between 3,745 establishments in all of the industries considered, each of which made returns in each of these years. This number of returns is much larger than ever before entered into consideration in these annual reports. The number of returns compared in each year beginning with 1886, is as follows :

YEARS.	Number of Establishments Considered	YEARS.	Number of Establishments Considered
1886, . . . . .	1,027	1889, . . . . .	1,364
1887, . . . . .	1,027	1890, . . . . .	3,041
1888, . . . . .	1,140	1891, . . . . .	3,745

The number of establishments compared in 1891 is nearly four times the number compared in the first volume of the series. This increased number of returns renders the comparisons much more indicative of the actual condition of the industries, and correspondingly increases the value of the reports.

Of course, not all the returns received in 1891 can be compared with those of previous years, as there are new establishments making return for the first time in the last named year, and there are others which for some legitimate reason failed to make return in each of the years.



The whole number of returns received in 1891 was 4,865.  
A detailed presentation of the output in these follows :

INDUSTRIES.	Number of Estab- lishments	VALUE OF GOODS MADE AND WORK DONE	
		Total Value	Average Value per Es- tablishment
Agricultural implements, . . . . .	11	\$1,196,237	\$108,749
Arms and ammunition, . . . . .	15	2,481,917	165,461
Artisans' tools, . . . . .	70	2,792,692	39,896
Awnings, sails, tents, etc., . . . . .	35	485,696	13,877
Boots and shoes, . . . . .	829	102,565,305	123,722
Boxes (paper and wooden), . . . . .	154	4,918,238	31,904
Brick, tiles, and sewer pipe, . . . . .	52	1,704,669	32,782
Brooms, brushes, and mops, . . . . .	25	1,364,449	54,578
Burial cases, caskets, coffins, etc., . . . . .	7	377,096	53,871
Buttons and dress trimmings, . . . . .	20	1,446,473	72,324
Carpetings, . . . . .	13	9,463,796	727,986
Carriages and wagons, . . . . .	147	5,117,298	34,812
Cement, kaolin, lime, and plaster, . . . . .	6	121,030	20,172
Chemical preparations (compounded), . . . . .	11	1,052,753	95,705
Clocks, watches, and jewelry, . . . . .	86	6,201,085	72,106
Clothing, . . . . .	150	28,072,766	187,152
Cooking, lighting, and heating apparatus, . . . . .	40	3,735,176	93,379
Cordage and twine, . . . . .	34	9,472,093	278,591
Corks, bungs, and taps, . . . . .	4	64,150	16,038
Cotton goods, . . . . .	166	91,128,368	548,966
Cotton, woollen, and other textiles, . . . . .	3	3,673,724	1,224,575
Crayons, pencils, crucibles, etc., . . . . .	4	179,685	44,921
Drugs and medicines, . . . . .	25	3,450,677	138,027
Dyestuffs, . . . . .	7	1,168,256	169,751
Earthen, plaster, and stone ware, . . . . .	6	381,572	63,595
Electrical apparatus and appliances, . . . . .	17	10,914,783	642,046
Electroplating, . . . . .	11	111,797	10,163
Emery and sand paper and cloth, etc., . . . . .	13	935,867	71,990
Fancy articles, . . . . .	7	265,092	37,870
Fertilizers, . . . . .	9	2,062,962	229,218
Fine arts and taxidermy, . . . . .	3	234,000	78,000
Fireworks and matches, . . . . .	3	99,113	33,038
Flax, hemp, jute, and linen goods, . . . . .	8	3,074,929	384,366
Food preparations, . . . . .	316	68,841,241	217,852
Furniture, . . . . .	156	11,065,028	70,930
Glass, . . . . .	11	597,056	54,278
Glue, isinglass, and starch, . . . . .	17	1,083,442	63,732
Hair work (animal and human), . . . . .	10	533,730	53,373
Hose: rubber, linen, etc., . . . . .	5	782,179	156,436
Hosiery and knit goods, . . . . .	47	6,099,302	129,772
Ink, mucilage, and paste, . . . . .	9	731,411	81,268
Ivory, bone, shell, and horn goods, etc., . . . . .	13	611,401	47,031
Leather, . . . . .	227	19,857,525	87,478
Liquors and beverages (not spirituous), . . . . .	22	691,229	31,420
Liquors: malt, distilled, and fermented, . . . . .	55	7,371,034	134,019
Lumber, . . . . .	30	3,394,354	113,145
Machines and machinery, . . . . .	345	27,353,685	79,286

INDUSTRIES.	Number of Estab- lishments	VALUE OF GOODS MADE AND WORK DONE	
		Total Value	Average Value per Es- tablishment
Metals and metallic goods, . . . . .	374	\$36,917,473	\$98,710
Mixed textiles, . . . . .	14	1,848,082	132,006
Models and patterns, . . . . .	10	138,872	13,887
Musical instruments and materials, . . . . .	62	5,497,951	88,677
Oils and illuminating fluids, . . . . .	9	1,308,633	145,404
Paints, colors, and crude chemicals, . . . . .	22	1,468,528	66,751
Paper and paper goods, . . . . .	110	26,793,014	243,573
Perfumes, toilet articles, etc., . . . . .	6	340,825	56,804
Photographs and photographic materials, . . . . .	15	315,859	21,057
Pollishes and dressing, . . . . .	27	1,787,298	66,196
Printing, publishing, and bookbinding, . . . . .	33	3,781,837	114,001
Print works, dye works, and bleacheries, . . . . .	46	17,604,580	382,708
Railroad construction and equipment, . . . . .	14	3,959,211	282,801
Rubber and elastic goods, . . . . .	35	23,826,233	680,750
Scientific instruments and appliances, . . . . .	19	1,521,347	80,071
Shipbuilding, . . . . .	51	1,466,234	29,338
Silk and silk goods, . . . . .	13	4,920,954	378,535
Sporting and athletic goods, . . . . .	11	488,043	44,368
Stone, . . . . .	214	5,264,455	24,600
Straw and palm leaf goods, . . . . .	19	3,897,905	205,153
Tallow, candles, soap, and grease, . . . . .	61	3,387,495	55,533
Tobacco, snuff, and cigars, . . . . .	46	2,719,154	59,112
Toys and games (children's), . . . . .	8	560,934	70,117
Trunks and valises, . . . . .	7	269,465	38,495
Whips, lashes, and stocks, . . . . .	16	1,176,653	73,541
Wooden goods, . . . . .	194	6,346,217	32,712
Woollen goods, . . . . .	151	45,193,459	299,294
Worsted goods, . . . . .	24	17,763,813	740,159
ALL INDUSTRIES, . . . . .	4,865	\$669,935,835	\$137,705

It will be seen from the line of totals in the foregoing table that the total value of goods made and work done in these 4,865 leading establishments is \$669,935,835, a product nearly as large as was turned out in all establishments in the year 1885, as returned in the Decennial Census. This, of itself, implies a large increase in the aggregate output in 1891 as compared with 1885. Direct comparisons between 1890 and 1885 appear in the proper place in the report.

As in previous years, the clerical force engaged in the preparation of this report has been in charge of Mr. Frank H. Drown, the Second Clerk. To him especially, and to the force generally my thanks are due; also to Mr. Charles F. Pidgin, the experienced and efficient Chief Clerk of the Bureau.

H. G. W.



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# STATISTICS OF MANUFACTURES.

1891.



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**PRIVATE FIRMS AND CORPORATIONS;  
PARTNERS AND STOCKHOLDERS:  
BY INDUSTRIES.**

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# PRIVATE FIRMS AND CORPORATIONS; PARTNERS AND STOCKHOLDERS: BY INDUSTRIES.

1890.

[There are duplications in the columns devoted to "Number of Private Firms," "Partners," "Number of Corporations," and "Stockholders." These duplications are indicated by an asterisk (\*). They are caused by the fact that the same firm or corporation is often engaged in manufacturing in two or more establishments located in different towns and sometimes in different industries. The plan adopted has been to consider each establishment (whether managed in connection with another or not) as one, and to credit the whole number of firms, partners, corporations, and stockholders to each industry, but to count them once only in making up the total for "All Industries."]

	INDUSTRIES.	Number of Estab- lishments Considered	Number of Private Firms	PARTNERS	
				Males	Females
1	Agricultural implements, . . . . .	11	6	8	-
2	Arms and ammunition, . . . . .	12	6	10	-
3	Artisans' tools, . . . . .	56	47	63	3
4	Awnings, sails, tents, etc., . . . . .	30	30	41	-
5	Boots and shoes, . . . . .	567	*538	*884	9
6	Boxes (paper and wooden), . . . . .	141	134	*187	3
7	Brick, tiles, and sewer pipe, . . . . .	45	38	58	5
8	Brooms, brushes, and mops, . . . . .	21	20	31	2
9	Burial cases, caskets, coffins, etc., . . . . .	6	4	5	-
10	Buttons and dress trimmings, . . . . .	17	12	19	1
11	Carpetings, . . . . .	12	6	8	-
12	Carriages and wagons, . . . . .	96	88	133	-
13	Cement, kaolin, lime, and plaster, . . . . .	4	4	8	-
14	Chemical preparations (compounded), . . . . .	9	6	7	2
15	Clocks, watches, and jewelry, . . . . .	77	71	140	6
16	Clothing, . . . . .	113	97	216	4
17	Cooking, lighting, and heating apparatus, . . . . .	31	15	29	-
18	Cordage and twine, . . . . .	25	8	14	1
19	Corks, bungs, and taps, . . . . .	4	4	5	-
20	Cotton goods, . . . . .	157	45	<sup>1</sup> 81	11
21	Cotton, woollen, and other textiles, . . . . .	3	1	3	-
22	Crayons, pencils, crucibles, etc., . . . . .	4	1	2	-
23	Drugs and medicines, . . . . .	19	13	20	3
24	Dyestuffs, . . . . .	7	3	3	1
25	Earthen, plaster, and stone ware, . . . . .	4	4	9	-
26	Electrical apparatus and appliances, . . . . .	5	1	1	-
27	Electroplating, . . . . .	10	10	15	-
28	Emery and sand paper and cloth, etc., . . . . .	13	2	3	-
29	Fancy articles, . . . . .	6	5	8	-
30	Fertilizers, . . . . .	7	6	10	-

<sup>1</sup> Includes 1 estate.

# PRIVATE FIRMS AND CORPORATIONS; PARTNERS AND STOCKHOLDERS: BY INDUSTRIES.

1890.

[There are duplications in the columns devoted to "Number of Private Firms," "Partners," "Number of Corporations," and "Stockholders." These duplications are indicated by an asterisk (\*). They are caused by the fact that the same firm or corporation is often engaged in manufacturing in two or more establishments located in different towns and sometimes in different industries. The plan adopted has been to consider each establishment (whether managed in connection with another or not) as one, and to credit the whole number of firms, partners, corporations, and stockholders to each industry, but to count them once only in making up the total for "All Industries."]

PARTNERS		Number of Corpora- tions	STOCKHOLDERS				AGGREGATES: Partners and Stockholders	
Special	Total		Males	Females	Banks, Trustees, etc.	Total		
-	8	5	71	17	2	90	98	1
-	10	6	99	27	8	134	144	2
-	66	9	340	193	44	577	643	3
-	41	-	-	-	-	-	41	4
1 19	*912	29	383	74	3	460	*1,372	5
2	*192	7	83	20	2	105	*297	6
-	63	7	164	48	-	212	275	7
-	33	1	20	7	3	30	63	8
-	5	2	119	10	4	133	138	9
1	21	5	55	14	3	72	93	10
-	6	6	451	336	154	941	947	11
1	134	8	129	59	6	194	328	12
-	8	-	-	-	-	-	8	13
-	9	3	26	5	3	34	43	14
5	151	6	134	27	-	161	312	15
3	223	16	317	122	13	452	675	16
1	30	16	349	69	13	431	461	17
3	18	17	372	129	18	519	537	18
-	5	-	-	-	-	-	5	19
1	93	*112	*9,795	*6,288	*2,250	*18,333	*18,426	20
-	3	*2	*198	*137	*111	*446	*449	21
-	2	3	34	20	1	55	57	22
-	23	6	124	13	4	141	164	23
-	4	4	34	13	-	47	51	24
-	9	-	-	-	-	-	9	25
-	1	4	1,230	496	-	1,726	1,727	26
-	15	-	-	-	-	-	15	27
-	3	11	95	15	1	111	114	28
-	8	*1	*3	-	-	*3	*11	29
-	10	1	85	10	-	95	105	30

1 Includes 1 female.



PRIVATE FIRMS, PARTNERS, ETC.: BY INDUSTRIES — 1890  
— Concluded.

	INDUSTRIES.	Number of Estab- lishments Considered	Number of Private Firms	PARTNERS	
				Males	Females
1	Fine arts and taxidermy, . . . . .	2	2	3	-
2	Fireworks and matches, . . . . .	3	2	4	-
3	Flax, hemp, jute, and linen goods, . . . . .	8	5	11	-
4	Food preparations, . . . . .	264	239	340	-
5	Furniture, . . . . .	120	107	<sup>1</sup> 184	4
6	Glass, . . . . .	10	8	12	-
7	Glue, isinglass, and starch, . . . . .	14	11	22	-
8	Hair work (animal and human), . . . . .	10	10	10	2
9	Hose: rubber, linen, etc., . . . . .	5	2	2	-
10	Hosiery and knit goods, . . . . .	40	29	44	2
11	Ink, muclage, and paste, . . . . .	8	8	10	-
12	Ivory, bone, shell, and horn goods, etc., . . . . .	13	13	23	1
13	Leather, . . . . .	154	<sup>*</sup> 147	250	-
14	Liquors and beverages (not spirituous), . . . . .	12	11	14	-
15	Liquors: malt, distilled, and fermented, . . . . .	49	41	63	3
16	Lumber, . . . . .	25	23	33	1
17	Machines and machinery, . . . . .	263	192	282	9
18	Metals and metallic goods, . . . . .	277	199	<sup>2</sup> 292	11
19	Mixed textiles, . . . . .	13	8	11	-
20	Models and patterns, . . . . .	5	5	9	-
21	Musical instruments and materials, . . . . .	46	34	52	-
22	Oils and illuminating fluids, . . . . .	9	7	12	-
23	Paints, colors, and crude chemicals, . . . . .	16	11	21	-
24	Paper and paper goods, . . . . .	102	<sup>*</sup> 41	84	-
25	Perfumes, toilet articles, etc., . . . . .	4	3	4	-
26	Photographs and photographic materials, . . . . .	11	10	13	-
27	Polishes and dressing, . . . . .	18	16	<sup>1</sup> 25	3
28	Printing, publishing, and bookbinding, . . . . .	24	15	27	1
29	Print works, dye works, and bleacheries, . . . . .	37	24	31	7
30	Railroad construction and equipment, . . . . .	14	2	3	-
31	Rubber and elastic goods, . . . . .	30	13	22	-
32	Scientific instruments and appliances, . . . . .	11	9	17	2
33	Shipbuilding, . . . . .	42	40	54	-
34	Silk and silk goods, . . . . .	9	3	3	1
35	Sporting and athletic goods, . . . . .	9	7	9	-
36	Stone, . . . . .	111	99	165	5
37	Straw and palm leaf goods, . . . . .	17	14	32	1
38	Tallow, candles, soap, and grease, . . . . .	65	52	72	1
39	Tobacco, snuff, and cigars, . . . . .	35	32	<sup>1</sup> 54	1
40	Toys and games (children's), . . . . .	8	5	8	2
41	Trunks and valises, . . . . .	7	7	11	-
42	Whips, lashes, and stocks, . . . . .	15	8	12	1
43	Wooden goods, . . . . .	149	139	188	4
44	Woollen goods, . . . . .	138	<sup>*</sup> 105	<sup>2</sup> 155	7
45	Worsted goods, . . . . .	21	12	22	1
46	ALL INDUSTRIES, . . . . .	3,745	2,987	<sup>4</sup> 4,731	121

<sup>1</sup> Includes 1 estate.<sup>2</sup> Includes 2 estates.<sup>3</sup> Includes 1 estate and 2 firms.<sup>4</sup> Includes 7 estates and 2 firms.

## PRIVATE FIRMS, PARTNERS, ETC.: BY INDUSTRIES — 1890

— Concluded.

PARTNERS		Number of Corpora- tions	STOCKHOLDERS				AGGREGATES: Partners and Stockholders	
Special	Total		Males	Females	Banks, Trustees, etc.	Total		
-	3	-	-	-	-	-	3	1
-	4	1	7	-	-	7	11	2
-	11	3	25	24	8	57	68	3
2	342	*25	289	48	3	340	682	4
6	194	13	292	99	24	415	609	5
-	12	2	20	-	-	20	32	6
1	23	3	20	-	4	24	47	7
-	12	-	-	-	-	-	12	8
-	2	3	49	14	1	64	66	9
-	46	*11	*473	*253	*220	*946	*992	10
-	10	-	-	-	-	-	10	11
-	24	-	-	-	-	-	24	12
2	252	7	53	23	41	117	369	13
-	14	1	16	7	-	23	37	14
-	66	*8	60	-	-	60	126	15
-	34	2	17	8	-	25	59	16
12	293	*71	1,170	341	133	1,644	1,937	17
-	303	78	1,329	513	77	1,919	2,222	18
-	11	5	23	6	1	30	41	19
-	9	-	-	-	-	-	9	20
-	52	12	122	50	-	172	224	21
-	12	2	35	21	1	57	69	22
1	22	5	99	11	-	110	132	23
-	84	*61	791	353	51	1,195	1,279	24
-	4	1	3	-	-	3	7	25
-	13	1	17	-	-	17	30	26
-	28	2	10	3	-	13	41	27
-	28	9	61	12	35	108	136	28
-	38	*13	*548	*426	*312	*1,286	*1,324	29
-	3	12	24	3	2	29	32	30
11	23	*17	*535	295	47	*877	*900	31
-	19	2	34	6	-	40	59	32
3	57	2	22	6	-	28	85	33
-	4	6	149	34	-	183	187	34
-	9	2	7	1	-	8	17	35
-	170	12	225	96	9	330	500	36
-	33	3	18	8	-	26	59	37
-	73	3	10	1	-	11	84	38
-	55	3	38	1	-	39	94	39
-	10	3	19	-	-	19	29	40
-	11	-	-	-	-	-	11	41
1	14	7	106	23	5	134	148	42
11	193	10	119	13	1	133	326	43
1	163	*33	*569	*308	141	*1,018	*1,181	44
-	23	*9	*302	*98	11	*411	*434	45
157	4,909	730	21,517	10,618	3,290	35,425	40,334	46

<sup>1</sup> Includes 1 female.<sup>2</sup> Includes 4 females.

# PRIVATE FIRMS AND CORPORATIONS; PARTNERS AND STOCKHOLDERS: BY INDUSTRIES.

1891.

[There are duplications in the columns devoted to "Number of Private Firms," "Partners," "Number of Corporations," and "Stockholders." These duplications are indicated by an asterisk (\*). They are caused by the fact that the same firm or corporation is often engaged in manufacturing in two or more establishments located in different towns and sometimes in different industries. The plan adopted has been to consider each establishment (whether managed in connection with another or not) as one, and to credit the whole number of firms, partners, corporations, and stockholders to each industry, but to count them once only in making up the total for "All Industries."]

	INDUSTRIES.	Number of Estab- lishments Considered	Number of Private Firms	PARTNERS	
				Males	Females
1	Agricultural implements, . . . . .	11	6	8	-
2	Arms and ammunition, . . . . .	12	5	9	-
3	Artisans' tools, . . . . .	56	47	61	3
4	Awnings, sails, tents, etc., . . . . .	30	30	41	-
5	Boots and shoes, . . . . .	567	*535	*879	7
6	Boxes (paper and wooden), . . . . .	141	133	*187	3
7	Brick, tiles, and sewer pipe, . . . . .	45	38	57	4
8	Brooms, brushes, and mops, . . . . .	21	20	32	1
9	Burial cases, caskets, coffins, etc., . . . . .	6	4	5	-
10	Buttons and dress trimmings, . . . . .	17	11	17	1
11	Carpets, . . . . .	12	6	6	-
12	Carriages and wagons, . . . . .	96	87	<sup>1</sup> 128	-
13	Cement, kaolin, lime, and plaster, . . . . .	4	4	7	-
14	Chemical preparations (compounded), . . . . .	9	6	7	2
15	Clocks, watches, and jewelry, . . . . .	77	71	148	5
16	Clothing, . . . . .	113	95	209	2
17	Cooking, lighting, and heating apparatus, . . . . .	31	16	31	-
18	Cordage and twine, . . . . .	25	8	12	1
19	Corks, bungs, and taps, . . . . .	4	4	5	-
20	Cotton goods, . . . . .	157	43	<sup>1</sup> 72	10
21	Cotton, woollen, and other textiles, . . . . .	3	1	3	-
22	Crayons, pencils, crucibles, etc., . . . . .	4	1	2	-
23	Drugs and medicines, . . . . .	19	14	21	4
24	Dyestuffs, . . . . .	7	3	4	1
25	Earthen, plaster, and stone ware, . . . . .	4	3	5	-
26	Electrical apparatus and appliances, . . . . .	5	1	1	-
27	Electroplating, . . . . .	10	10	15	-
28	Emery and sand paper and cloth, etc., . . . . .	13	2	3	-
29	Fancy articles, . . . . .	6	5	8	-
30	Fertilizers, . . . . .	7	6	10	-

<sup>1</sup> Includes 1 estate.

# PRIVATE FIRMS AND CORPORATIONS; PARTNERS AND STOCKHOLDERS: BY INDUSTRIES.

1891.

[There are duplications in the columns devoted to "Number of Private Firms," "Partners," "Number of Corporations," and "Stockholders." These duplications are indicated by an asterisk (\*). They are caused by the fact that the same firm or corporation is often engaged in manufacturing in two or more establishments located in different towns and sometimes in different industries. The plan adopted has been to consider each establishment (whether managed in connection with another or not) as one, and to credit the whole number of firms, partners, corporations, and stockholders to each industry, but to count them once only in making up the total for "All Industries."]

PARTNERS		Number of Corporations	STOCKHOLDERS				AGGREGATES: Partners and Stockholders	
Special	Total		Males	Females	Banks, Trustees, etc.	Total		
-	8	5	63	20	1	84	92	1
-	9	7	108	25	1	134	143	2
-	64	9	338	211	54	603	667	3
-	41	-	-	-	-	-	41	4
<sup>1</sup> 10	*896	32	413	74	3	490	*1,386	5
2	*192	8	76	17	2	95	*237	6
-	61	7	166	46	-	211	272	7
-	33	1	20	11	4	35	68	8
-	5	2	119	10	5	134	139	9
1	19	6	60	17	3	80	99	10
-	6	6	431	339	177	947	963	11
3	181	9	117	57	17	191	322	12
-	7	-	-	-	-	-	7	13
-	9	3	26	4	3	33	42	14
2	155	6	139	25	-	164	319	15
1	212	18	406	160	22	577	789	16
-	31	15	202	56	7	265	296	17
3	16	*17	363	126	15	504	520	18
-	5	-	-	-	-	-	5	19
1	83	*114	*9,869	*6,513	*2,445	*18,827	*18,910	20
-	3	*2	*197	*138	*117	*452	*465	21
-	2	3	47	37	1	85	87	22
-	25	5	64	29	4	97	122	23
-	5	4	34	13	-	47	52	24
-	5	1	10	2	-	12	17	25
-	1	4	1,684	687	20	2,391	2,392	26
-	15	-	-	-	-	-	15	27
-	3	11	92	16	1	109	112	28
-	8	*1	*3	-	-	*3	*11	29
-	10	1	87	10	-	97	107	30

<sup>1</sup> Includes 1 female.

PRIVATE FIRMS, PARTNERS, ETC.: BY INDUSTRIES — 1891  
— Concluded.

	INDUSTRIES.	Number of Estab- lishments Considered	Number of Private Firms	PARTNERS	
				Males	Females
1	Fine arts and taxidermy, . . . . .	2	1	1	-
2	Fireworks and matches, . . . . .	3	2	5	-
3	Flax, hemp, jute, and linen goods, . . . . .	8	5	11	-
4	Food preparations, . . . . .	264	238	339	3
5	Furniture, . . . . .	120	106	<sup>1</sup> 187	5
6	Glass, . . . . .	10	8	11	1
7	Glue, isinglass, and starch, . . . . .	14	11	25	1
8	Hair work (animal and human), . . . . .	10	10	7	3
9	Hose: rubber, linen, etc., . . . . .	5	2	2	-
10	Hosiery and knit goods, . . . . .	40	27	42	2
11	Ink, mucilage, and paste, . . . . .	8	8	10	-
12	Ivory, bone, shell, and horn goods, etc., . . . . .	13	13	22	1
13	Leather, . . . . .	154	<sup>*</sup> 143	<sup>1</sup> 233	1
14	Liquors and beverages (not spirituous), . . . . .	12	11	13	-
15	Liquors: malt, distilled, and fermented, . . . . .	49	41	64	3
16	Lumber, . . . . .	25	23	33	1
17	Machines and machinery, . . . . .	263	189	<sup>1</sup> 277	8
18	Metals and metallic goods, . . . . .	277	196	<sup>2</sup> 290	10
19	Mixed textiles, . . . . .	13	7	9	-
20	Models and patterns, . . . . .	5	5	9	-
21	Musical instruments and materials, . . . . .	46	33	50	-
22	Oils and illuminating fluids, . . . . .	9	7	11	-
23	Paints, colors, and crude chemicals, . . . . .	16	11	19	-
24	Paper and paper goods, . . . . .	102	<sup>*</sup> 40	83	-
25	Perfumes, toilet articles, etc., . . . . .	4	3	3	-
26	Photographs and photographic materials, . . . . .	11	10	13	-
27	Polishes and dressing, . . . . .	18	16	26	3
28	Printing, publishing, and bookbinding, . . . . .	24	14	27	-
29	Print works, dye works, and bleacheries, . . . . .	37	23	27	4
30	Railroad construction and equipment, . . . . .	14	2	3	-
31	Rubber and elastic goods, . . . . .	30	14	26	1
32	Scientific instruments and appliances, . . . . .	11	9	17	2
33	Shipbuilding, . . . . .	42	40	54	-
34	Silk and silk goods, . . . . .	9	2	1	1
35	Sporting and athletic goods, . . . . .	9	7	8	-
36	Stone, . . . . .	111	99	161	6
37	Straw and palm leaf goods, . . . . .	17	14	33	1
38	Tallow, candles, soap, and grease, . . . . .	55	52	72	1
39	Tobacco, snuff, and cigars, . . . . .	35	31	<sup>1</sup> 49	1
40	Toys and games (children's), . . . . .	8	5	8	2
41	Trunks and valises, . . . . .	7	7	11	-
42	Whips, lashes, and stocks, . . . . .	15	8	14	-
43	Wooden goods, . . . . .	149	138	191	3
44	Woollen goods, . . . . .	138	<sup>*</sup> 105	<sup>1</sup> 154	9
45	Worsted goods, . . . . .	21	11	20	1
46	ALL INDUSTRIES, . . . . .	3,745	2,952	<sup>2</sup> 4,661	118

<sup>1</sup> Includes 1 estate.<sup>2</sup> Includes 2 estates.<sup>3</sup> Includes 9 estates.

**PRIVATE FIRMS, PARTNERS, ETC.: BY INDUSTRIES — 1891**  
— Concluded.

PARTNERS		Number of Corpora- tions	STOCKHOLDERS				AGGREGATES: Partners and Stockholders	
Special	Total		Males	Females	Banks, Trustees, etc.	Total		
-	1	1	8	-	1	9	10	1
-	5	1	3	-	-	3	8	2
-	11	3	25	26	7	58	69	3
3	345	*26	401	74	5	480	825	4
5	197	14	267	113	43	423	620	5
-	12	2	19	1	-	20	32	6
-	26	3	21	1	-	22	48	7
-	10	-	-	-	-	-	10	8
-	2	3	84	12	5	101	103	9
1	45	*13	*439	*290	*228	*957	*1,002	10
-	10	-	-	-	-	-	10	11
1	24	-	-	-	-	-	24	12
2	236	11	124	46	43	213	449	13
-	13	1	19	7	-	26	39	14
-	67	*8	66	1	-	67	134	15
-	34	2	21	17	3	41	75	16
15	290	*74	1,533	522	145	2,205	2,495	17
-	300	81	1,287	508	124	1,919	2,219	18
-	9	6	44	9	1	54	63	19
-	9	-	-	-	-	-	9	20
-	50	13	153	56	4	213	263	21
-	11	2	39	21	1	61	72	22
1	20	5	94	8	-	102	122	23
-	83	*62	787	358	50	1,195	1,278	24
-	3	1	3	-	-	3	6	25
-	13	1	18	-	-	18	31	26
-	29	2	13	3	-	16	45	27
-	27	10	55	11	25	91	118	28
2	33	*14	*563	*446	*322	*1,331	*1,364	29
-	3	12	31	7	2	40	43	30
-	27	*16	*528	291	53	*872	*899	31
-	19	2	33	5	1	39	58	32
1	55	2	21	5	3	29	84	33
-	2	7	187	47	6	240	242	34
-	8	2	7	1	-	8	16	35
-	167	12	222	98	9	329	406	36
-	34	3	17	9	-	26	60	37
-	73	3	10	1	-	11	84	38
-	50	4	37	1	1	39	89	39
-	10	3	18	-	-	18	28	40
-	11	-	-	-	-	-	11	41
-	14	7	109	30	2	141	155	42
-	194	11	131	16	3	150	344	43
1	164	*33	*541	*323	166	*1,030	*1,104	44
-	21	*10	*284	*108	*36	*428	*449	45
*45	4,824	762	22,487	11,479	3,661	37,627	42,451	46

\* Includes 1 female.

\* Includes 4 females.

PRIVATE FIRMS, PARTNERS, ETC.: BY INDUSTRIES — 1890,  
1891 — Continued.

## RECAPITULATION. BY NUMBER ONLY. ALL INDUSTRIES.

[In the following presentation, a classification of partners and stockholders by number is given. The duplications in the preceding presentations, explained in the head-notes (pages 4, 5, 8, and 9), are eliminated so that the actual number of private firms and corporations and partners and stockholders, engaged in carrying on the 3,745 establishments, is shown for both years. The decrease of three establishments in 1891 as compared with 1890 is accounted for by changes in management.]

CLASSIFICATION OF PARTNERS AND STOCKHOLDERS.	NUMBER OF ESTABLISHMENTS		NUMBER OF PARTNERS AND STOCKHOLDERS	
	1890	1891	1890	1891
<i>Partners.</i>	2,987	2,952	4,909	4,824
1 partner, . . . . .	1,645	1,656	1,645	1,656
2 partners, . . . . .	933	894	1,866	1,788
3 partners, . . . . .	300	295	960	985
4 partners, . . . . .	70	68	280	272
5 partners, . . . . .	24	23	120	115
6 partners, . . . . .	8	7	48	42
7 partners, . . . . .	6	6	42	42
8 partners, . . . . .	1	3	8	24
<i>Stockholders.</i>	730	762	35,425	37,627
1 stockholder, . . . . .	1	2	1	2
2 stockholders, . . . . .	7	5	14	10
3 stockholders, . . . . .	81	85	243	255
4 stockholders, . . . . .	64	73	256	292
5 stockholders, . . . . .	60	60	300	300
6 stockholders, . . . . .	45	52	276	312
7 stockholders, . . . . .	27	24	289	168
8 stockholders, . . . . .	34	37	272	296
9 stockholders, . . . . .	18	13	162	117
10 stockholders, . . . . .	15	27	150	270
11 stockholders, . . . . .	19	17	109	187
12 stockholders, . . . . .	8	9	96	108
13 stockholders, . . . . .	12	11	166	143
14 stockholders, . . . . .	15	13	210	182
15 stockholders, . . . . .	14	13	210	195
16 stockholders, . . . . .	11	12	176	192
17 stockholders, . . . . .	13	13	221	221
18 stockholders, . . . . .	8	7	54	126
19 stockholders, . . . . .	4	5	76	95
20 stockholders, . . . . .	4	4	80	80
21 stockholders, . . . . .	5	3	105	63
22 stockholders, . . . . .	7	9	154	198
23 stockholders, . . . . .	7	2	161	46
24 stockholders, . . . . .	7	8	168	192
25 stockholders, . . . . .	6	4	150	100
26 stockholders, . . . . .	2	5	52	130
27 stockholders, . . . . .	8	7	216	189
28 stockholders, . . . . .	3	3	84	84
29 stockholders, . . . . .	5	7	145	203
30 stockholders, . . . . .	4	6	120	180
31 stockholders, . . . . .	5	6	155	186
32 stockholders, . . . . .	8	3	256	96
33 stockholders, . . . . .	-	2	-	66
34 stockholders, . . . . .	4	6	136	204
35 stockholders, . . . . .	3	4	105	140
36 stockholders, . . . . .	3	3	108	108
37 stockholders, . . . . .	4	5	148	185
38 stockholders, . . . . .	4	3	152	114
39 stockholders, . . . . .	3	2	117	78
40 stockholders, . . . . .	2	2	80	80
41 stockholders, . . . . .	2	2	82	82
42 stockholders, . . . . .	2	6	84	252
43 stockholders, . . . . .	2	2	86	86
44 stockholders, . . . . .	2	-	88	-
45 stockholders, . . . . .	1	1	45	45
46 stockholders, . . . . .	3	1	138	46
47 stockholders, . . . . .	2	1	94	47

PRIVATE FIRMS, PARTNERS, ETC.: BY INDUSTRIES — 1890,  
1891 — Continued.RECAPITULATION. BY NUMBER ONLY. ALL INDUSTRIES  
— Continued.

CLASSIFICATION OF PARTNERS AND STOCKHOLDERS.	NUMBER OF ESTABLISHMENTS		NUMBER OF PARTNERS AND STOCKHOLDERS	
	1890	1891	1890	1891
<i>Stockholders—Con.</i>				
48 stockholders, . . . . .	1	6	48	288
49 stockholders, . . . . .	—	2	—	98
50 stockholders, . . . . .	3	—	150	—
51 stockholders, . . . . .	2	3	102	163
52 stockholders, . . . . .	4	4	208	208
53 stockholders, . . . . .	3	5	159	265
54 stockholders, . . . . .	4	3	216	162
55 stockholders, . . . . .	4	3	220	165
56 stockholders, . . . . .	2	1	112	56
57 stockholders, . . . . .	1	1	57	57
58 stockholders, . . . . .	3	1	174	68
59 stockholders, . . . . .	2	2	118	118
60 stockholders, . . . . .	2	4	120	240
61 stockholders, . . . . .	2	1	122	61
62 stockholders, . . . . .	4	1	248	62
63 stockholders, . . . . .	1	2	63	126
64 stockholders, . . . . .	1	1	64	64
65 stockholders, . . . . .	2	2	130	130
66 stockholders, . . . . .	2	3	132	198
67 stockholders, . . . . .	—	2	—	134
68 stockholders, . . . . .	4	1	272	68
69 stockholders, . . . . .	3	2	207	138
70 stockholders, . . . . .	1	1	70	70
71 stockholders, . . . . .	2	2	142	142
74 stockholders, . . . . .	—	1	—	74
75 stockholders, . . . . .	—	1	—	75
76 stockholders, . . . . .	2	—	152	—
77 stockholders, . . . . .	—	1	—	77
78 stockholders, . . . . .	—	3	—	234
79 stockholders, . . . . .	1	3	79	237
80 stockholders, . . . . .	4	2	320	160
81 stockholders, . . . . .	1	1	81	81
82 stockholders, . . . . .	1	2	82	164
83 stockholders, . . . . .	—	1	—	85
86 stockholders, . . . . .	3	1	258	86
87 stockholders, . . . . .	1	—	87	—
88 stockholders, . . . . .	1	—	88	88
90 stockholders, . . . . .	—	2	—	180
91 stockholders, . . . . .	1	1	91	91
92 stockholders, . . . . .	1	2	92	184
93 stockholders, . . . . .	1	1	93	93
95 stockholders, . . . . .	2	1	190	95
96 stockholders, . . . . .	—	—	192	—
97 stockholders, . . . . .	2	2	194	194
99 stockholders, . . . . .	—	1	—	99
104 stockholders, . . . . .	1	—	104	—
105 stockholders, . . . . .	2	1	210	105
109 stockholders, . . . . .	—	2	—	218
112 stockholders, . . . . .	1	—	112	—
113 stockholders, . . . . .	—	1	—	113
115 stockholders, . . . . .	1	—	115	—
117 stockholders, . . . . .	1	1	117	117
118 stockholders, . . . . .	1	—	118	—
119 stockholders, . . . . .	—	1	—	119
120 stockholders, . . . . .	1	1	120	120
122 stockholders, . . . . .	—	1	—	122
124 stockholders, . . . . .	—	1	—	124
125 stockholders, . . . . .	—	1	—	125
126 stockholders, . . . . .	1	—	126	—
127 stockholders, . . . . .	—	1	—	127
128 stockholders, . . . . .	2	—	256	—
129 stockholders, . . . . .	1	—	129	—
130 stockholders, . . . . .	—	1	—	130
131 stockholders, . . . . .	—	1	—	131
133 stockholders, . . . . .	1	—	133	—
134 stockholders, . . . . .	1	—	134	—



PRIVATE FIRMS, PARTNERS, ETC.: BY INDUSTRIES — 1890,  
1891 — Continued.RECAPITULATION. BY NUMBER ONLY. ALL INDUSTRIES  
— Continued.

CLASSIFICATION OF PARTNERS AND STOCKHOLDERS.	NUMBER OF ESTABLISHMENTS		NUMBER OF PARTNERS AND STOCKHOLDERS	
	1890	1891	1890	1891
<i>Stockholders — Con.</i>				
138 stockholders, . . . . .	1	2	136	272
139 stockholders, . . . . .	-	1	-	139
140 stockholders, . . . . .	1	-	140	-
141 stockholders, . . . . .	1	-	141	-
143 stockholders, . . . . .	-	1	-	143
144 stockholders, . . . . .	-	1	-	144
145 stockholders, . . . . .	1	-	145	-
148 stockholders, . . . . .	1	-	148	-
150 stockholders, . . . . .	3	2	450	300
151 stockholders, . . . . .	1	-	151	-
153 stockholders, . . . . .	-	1	-	153
154 stockholders, . . . . .	-	1	-	154
155 stockholders, . . . . .	-	1	-	155
156 stockholders, . . . . .	-	1	-	156
164 stockholders, . . . . .	1	2	164	328
169 stockholders, . . . . .	1	-	169	-
176 stockholders, . . . . .	-	1	-	176
177 stockholders, . . . . .	2	-	554	-
179 stockholders, . . . . .	1	1	184	179
184 stockholders, . . . . .	1	-	184	-
187 stockholders, . . . . .	1	-	187	-
193 stockholders, . . . . .	-	1	-	193
195 stockholders, . . . . .	1	-	195	-
197 stockholders, . . . . .	2	-	394	-
199 stockholders, . . . . .	-	2	-	398
202 stockholders, . . . . .	1	-	202	-
205 stockholders, . . . . .	-	1	-	205
208 stockholders, . . . . .	1	1	208	208
210 stockholders, . . . . .	-	2	-	420
214 stockholders, . . . . .	1	-	214	-
218 stockholders, . . . . .	1	-	218	-
222 stockholders, . . . . .	-	1	-	222
225 stockholders, . . . . .	-	1	-	225
227 stockholders, . . . . .	1	-	227	-
233 stockholders, . . . . .	1	-	233	-
234 stockholders, . . . . .	1	-	234	-
236 stockholders, . . . . .	-	1	-	236
238 stockholders, . . . . .	-	1	-	238
240 stockholders, . . . . .	1	-	240	-
242 stockholders, . . . . .	-	1	-	242
245 stockholders, . . . . .	1	-	245	-
246 stockholders, . . . . .	-	1	-	246
250 stockholders, . . . . .	1	-	250	-
251 stockholders, . . . . .	1	1	251	251
252 stockholders, . . . . .	1	1	252	252
253 stockholders, . . . . .	1	1	253	253
254 stockholders, . . . . .	1	-	254	-
255 stockholders, . . . . .	1	-	255	-
256 stockholders, . . . . .	-	1	-	256
257 stockholders, . . . . .	-	1	-	257
258 stockholders, . . . . .	-	1	-	258
259 stockholders, . . . . .	-	1	-	259
263 stockholders, . . . . .	1	1	263	263
275 stockholders, . . . . .	-	2	-	550
277 stockholders, . . . . .	1	-	277	-
289 stockholders, . . . . .	1	-	289	-
290 stockholders, . . . . .	1	-	290	-
295 stockholders, . . . . .	-	1	-	295
299 stockholders, . . . . .	-	1	-	299
300 stockholders, . . . . .	1	1	300	300
302 stockholders, . . . . .	-	1	-	302
309 stockholders, . . . . .	1	-	309	-
334 stockholders, . . . . .	1	-	334	-
340 stockholders, . . . . .	-	1	-	340
353 stockholders, . . . . .	2	-	706	-
356 stockholders, . . . . .	-	1	-	356

PRIVATE FIRMS, PARTNERS, ETC.: BY INDUSTRIES—1890,  
1891—Concluded.RECAPITULATION. BY NUMBER ONLY. ALL INDUSTRIES  
—Concluded.

CLASSIFICATION OF PARTNERS AND STOCKHOLDERS.	NUMBER OF ESTABLISHMENTS		NUMBER OF PARTNERS AND STOCKHOLDERS	
	1890	1891	1890	1891
<i>Stockholders—Con.</i>				
360 stockholders, . . . . .	-	1	-	360
362 stockholders, . . . . .	-	1	-	362
363 stockholders, . . . . .	1	-	363	-
364 stockholders, . . . . .	-	1	-	364
370 stockholders, . . . . .	1	1	370	370
371 stockholders, . . . . .	1	-	371	-
372 stockholders, . . . . .	1	1	372	372
374 stockholders, . . . . .	1	-	374	-
380 stockholders, . . . . .	-	1	-	380
392 stockholders, . . . . .	1	1	392	392
394 stockholders, . . . . .	-	1	-	394
408 stockholders, . . . . .	3	-	1,224	-
413 stockholders, . . . . .	-	1	-	413
415 stockholders, . . . . .	1	1	415	415
421 stockholders, . . . . .	-	1	-	421
424 stockholders, . . . . .	-	1	-	424
429 stockholders, . . . . .	1	-	429	-
432 stockholders, . . . . .	1	1	432	432
437 stockholders, . . . . .	1	-	437	-
439 stockholders, . . . . .	1	-	439	-
440 stockholders, . . . . .	1	-	440	-
443 stockholders, . . . . .	-	1	-	443
447 stockholders, . . . . .	-	1	-	447
448 stockholders, . . . . .	-	1	-	448
455 stockholders, . . . . .	-	1	-	455
471 stockholders, . . . . .	1	-	471	-
495 stockholders, . . . . .	-	1	-	495
530 stockholders, . . . . .	1	-	530	-
535 stockholders, . . . . .	-	1	-	535
716 stockholders, . . . . .	1	-	716	-
725 stockholders, . . . . .	-	1	-	725
754 stockholders, . . . . .	1	-	754	-
755 stockholders, . . . . .	-	1	-	755
793 stockholders, . . . . .	1	-	793	-
802 stockholders, . . . . .	-	1	-	802
870 stockholders, . . . . .	-	1	-	870
873 stockholders, . . . . .	1	-	873	-
926 stockholders, . . . . .	1	-	926	-
961 stockholders, . . . . .	-	1	-	961
1,640 stockholders, . . . . .	1	-	1,640	-
2,294 stockholders, . . . . .	-	1	-	2,294
Railroad corporations, . . . . .	10	10	*10	*10
Syndicates, . . . . .	5	5	*5	*5

\* Called "one stockholder" to each corporation and syndicate. Actual number of stockholders not returned.



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**CAPITAL INVESTED:**  
**BY INDUSTRIES.**

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## CAPITAL INVESTED: BY INDUSTRIES.

1890, 1891.

[In this presentation, the figures given under "Amount of Capital Invested" represent the returns made by the same establishments, in each industry, for the years 1890 and 1891, the whole number of establishments considered in "All Industries" being 3,745. Comparison is made, as regards the amount of capital invested, between these two years. The relative increase or decrease in 1891 as compared with 1890 is given with its equivalent percentage.]

INDUSTRIES.	Number of Establishments Considered	AMOUNT OF CAPITAL INVESTED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percentages
Agricultural implements, . . .	11	\$1,485,535	\$1,283,071	—\$202,464	—13.63
Arms and ammunition, . . .	12	4,704,047	4,646,157	—57,890	—1.23
Artisans' tools, . . .	56	2,738,999	2,813,628	+74,629	+2.72
Awnings, sails, tents, etc., . .	30	148,466	151,560	+3,094	+2.08
Boots and shoes, . . .	567	27,790,899	27,507,315	—283,584	—1.02
Boxes (paper and wooden), . .	141	2,300,607	2,378,995	+78,388	+3.41
Brick, tiles, and sewer pipe, . .	45	1,262,495	1,318,245	+55,750	+4.42
Brooms, brushes, and mops, . .	21	818,341	818,831	+490	+0.06
Burial cases, caskets, coffins, etc., .	6	311,724	423,459	+111,735	+35.84
Buttons and dress trimmings, . .	17	875,022	916,561	+41,539	+4.75
Carpetings, . . .	12	7,905,635	7,687,708	—217,927	—2.76
Carrriages and wagons, . . .	96	3,067,800	3,039,795	—28,005	—0.91
Cement, kaolin, lime, and plaster, .	4	43,500	53,000	+9,500	+21.84
Chemical preparations (compound- ed), . . .	9	735,994	743,707	+7,713	+1.05
Clocks, watches, and jewelry, . .	77	5,102,538	5,305,554	+203,016	+3.98
Clothing, . . .	113	10,609,728	10,862,675	+252,947	+2.38
Cooking, lighting, and heating ap- paratus, . . .	31	2,849,325	2,821,217	—28,108	—0.99
Cordage and twine, . . .	25	6,352,588	6,639,628	+287,040	+4.52
Corks, bungs, and taps, . . .	4	22,680	29,000	+6,320	+27.87
Cotton goods, . . .	157	114,947,374	117,933,102	+2,985,728	+2.60
Cotton, woollen, and other textiles,	3	3,535,953	3,535,953	*=	*=
Crayons, pencils, crucibles, etc., .	4	157,500	186,000	+28,500	+18.10
Drugs and medicines, . . .	19	1,211,399	1,350,018	+138,619	+11.44
Dyestuffs, . . .	7	658,200	658,000	—200	—0.03
Earthen, plaster, and stone ware, .	4	294,000	283,000	—11,000	—3.74
Electrical apparatus and appli- ances, . . .	5	10,258,480	10,220,418	—38,062	—0.37
Electroplating, . . .	10	47,400	47,400	*=	*=
Emery and sand paper and cloth, etc.,	13	802,861	781,682	—21,179	—2.64
Fancy articles, . . .	6	81,000	78,660	—2,340	—2.89
Fertilizers, . . .	7	159,970	159,470	—500	—0.31
Fine arts and taxidermy, . . .	2	32,000	7,000	—25,000	—78.13
Fireworks and matches, . . .	3	38,791	42,000	+3,209	+8.27
Flax, hemp, jute, and linen goods, .	8	2,090,361	2,403,554	+313,193	+14.98
Food preparations, . . .	264	15,024,113	16,517,420	+1,493,307	+9.94

\* No change reported.

## CAPITAL INVESTED: BY INDUSTRIES—1890, 1891—Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	AMOUNT OF CAPITAL INVESTED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Furniture, . . . . .	120	\$7,120,072	\$5,817,024	—\$1,303,048	—18.30
Glass, . . . . .	10	423,300	456,000	+32,700	+7.73
Glue, isinglass, and starch, . .	14	1,049,365	1,023,815	—25,550	—2.43
Hair work (animal and human), .	10	205,800	199,500	—6,000	—2.92
Hose: rubber, linen, etc., . . .	5	890,800	895,500	+4,700	+0.53
Hosiery and knit goods, . . . .	40	4,117,184	4,219,478	+102,294	+2.48
Ink, mucilage, and paste, . . .	8	301,500	305,733	+4,233	+1.40
Ivory, bone, shell, and horn goods, etc.,	13	207,300	232,100	+24,800	+11.96
Leather, . . . . .	154	9,039,011	8,212,735	—826,276	—9.14
Liquors and beverages (not spirit- uous), . . . . .	12	163,500	172,500	+9,000	+5.50
Liquors: malt, distilled, and fer- mented, . . . . .	49	5,602,129	5,786,791	+184,662	+3.30
Lumber, . . . . .	25	1,434,185	2,919,881	+1,485,696	+103.59
Machines and machinery, . . .	263	24,537,451	26,027,625	+2,090,174	+8.52
Metals and metallic goods, . . .	277	23,617,954	25,805,602	+2,187,648	+9.26
Mixed textiles, . . . . .	13	1,035,840	1,087,281	+51,441	+4.97
Models and patterns, . . . . .	5	35,255	37,812	+2,557	+7.25
Musical instruments and materials,	46	4,440,484	4,683,783	+243,299	+5.48
Oils and illuminating fluids, . .	9	739,623	761,220	+21,597	+2.92
Paints, colors, and crude chemicals,	16	1,359,887	1,388,401	+28,514	+2.10
Paper and paper goods, . . . .	102	22,120,916	22,556,155	+435,239	+1.97
Perfumes, toilet articles, etc., .	4	140,000	144,000	+4,000	+2.86
Photographs and photographic ma- terials, . . . . .	11	202,900	199,500	—3,400	—1.68
Pollaxes and dressing, . . . . .	18	810,000	713,498	—96,502	—11.91
Printing, publishing, and bookbind- ing, . . . . .	24	3,419,441	3,441,057	+21,616	+0.63
Print works, dye works, and bleach- eries, . . . . .	37	13,622,745	12,708,464	—914,281	—6.71
Railroad construction and equipment,	14	1,695,000	1,765,000	+70,000	+4.13
Rubber and elastic goods, . . .	30	13,404,303	15,143,966	+1,739,663	+12.98
Scientific instruments and appli- ances, . . . . .	11	959,950	1,026,523	+66,573	+6.94
Shipbuilding, . . . . .	42	769,785	769,300	—485	—0.06
Silk and silk goods, . . . . .	9	2,721,930	2,224,383	—497,547	—18.28
Sporting and athletic goods, . .	9	267,987	318,382	+50,395	+18.81
Stone, . . . . .	111	2,866,749	2,821,409	—45,340	—1.58
Straw and palm leaf goods, . . .	17	1,455,913	1,350,283	—105,630	—7.26
Tallow, candles, soap, and grease, .	55	1,600,100	1,676,972	+76,872	+4.80
Tobacco, snuff, and cigars, . . .	35	719,639	829,105	+109,466	+15.21
Toys and games (children's), . .	8	327,636	334,000	+6,364	+1.94
Trunks and valises, . . . . .	7	89,700	90,200	+500	+0.56
Whips, lashes, and stocks, . . .	15	706,809	722,635	+15,826	+2.24
Wooden goods, . . . . .	149	2,858,079	2,927,404	+74,325	+2.61
Woollen goods, . . . . .	138	28,271,436	27,835,204	—436,232	—1.54
Worsteds goods, . . . . .	21	10,912,129	10,782,298	—129,831	—1.19
ALL INDUSTRIES, . . . . .	3,745	\$424,723,812	\$434,656,802	+\$9,932,990	+2.34

## COMPARISON OF CAPITAL INVESTED. SAME ESTABLISHMENTS. FOR THE YEARS

**1885, 1890.**

[In this presentation, the figures given under "Amount of Capital Invested" represent the returns made by the same establishments, in each industry, for 1890 and the Census year 1885, the whole number of establishments considered in "All Industries" being 3,817. Comparison is made, as regards the amount of capital invested, between these two years. The relative increase or decrease in 1890 as compared with 1885 is given with its equivalent percentage.]

INDUSTRIES.	Number of Estab- lishments Con- sidered	AMOUNT OF CAPITAL INVESTED		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
Agricultural implements, . . .	11	\$1,572,989	\$1,485,535	-\$87,454	-5.56
Arms and ammunition, . . .	13	4,260,184	4,868,047	+607,863	+14.27
Artisans' tools, . . .	56	2,774,693	2,741,499	-33,194	-1.20
Awnings, sails, tents, etc., . .	34	126,932	167,366	+40,534	+31.96
Boots and shoes, . . .	528	23,293,493	28,448,028	+5,154,535	+22.13
Boxes (paper and wooden), . . .	130	2,074,486	2,259,785	+185,299	+8.93
Brick, tiles, and sewer pipe, . .	50	1,970,520	1,838,495	-132,025	-6.70
Brooms, brushes, and mops, . .	20	199,049	203,238	+4,189	+2.10
Burial cases, caskets, coffins, etc.,	5	174,050	261,724	+87,674	+50.37
Buttons and dress trimmings, . .	15	1,098,374	813,022	-285,352	-25.98
Carpets, . . .	11	7,231,443	7,854,349	+622,906	+8.61
Carriages and wagons, . . .	123	3,531,337	4,016,953	+485,616	+13.75
Cement, kaolin, lime, and plaster, .	4	27,630	57,000	+29,370	+106.30
Chemical preparations (compound- ed), . . .	12	842,729	781,494	-61,235	-7.27
Clocks, watches, and jewelry, . .	86	7,728,076	9,235,442	+1,507,366	+19.51
Clothing, . . .	126	8,624,087	10,754,410	+2,130,323	+24.70
Cooking, lighting, and heating ap- paratus, . . .	41	3,168,956	3,121,075	-47,881	-1.51
Cordage and twine, . . .	24	3,985,533	6,197,588	+2,212,055	+55.50
Corks, bungs, and taps, . . .	2	27,935	14,180	-13,755	-49.24
Cotton goods, . . .	142	116,355,276	109,173,772	-7,181,504	-6.17
Cotton, woollen, and other textiles,	2	4,492,000	3,520,953	-971,047	-21.62
Crayons, pencils, crucibles, etc., .	3	118,640	88,500	-30,140	-25.40
Drugs and medicines, . . .	20	949,491	1,230,019	+280,528	+29.55
Dyestuffs, . . .	6	346,200	458,200	+112,000	+32.35
Earthen, plaster, and stone ware, .	5	189,750	369,000	+179,250	+94.47
Electrical apparatus and appliances,	4	260,656	10,250,480	+9,989,824	+3,832.57
Electroplating, . . .	10	63,550	51,400	-12,150	-19.12
Emery and sand paper and cloth, etc.,	10	623,994	579,917	-44,077	-7.06
Fancy articles, . . .	5	39,645	46,000	+6,355	+16.03
Fertilizers, . . .	6	123,320	106,100	-17,220	-13.96
Fine arts and taxidermy, . . .	3	2,510	37,000	+34,490	+1,374.10
Fireworks and matches, . . .	2	14,500	12,000	-2,500	-17.24
Flax, hemp, jute, and linen goods, .	8	2,299,380	2,105,661	-193,719	-8.42
Food preparations, . . .	332	13,051,415	16,579,885	+3,528,470	+27.04
Furniture, . . .	150	5,197,258	5,900,822	+703,564	+13.54

## CAPITAL INVESTED: BY INDUSTRIES — Concluded.

COMPARISON OF CAPITAL INVESTED. SAME ESTABLISHMENTS.  
FOR THE YEARS 1885, 1890 — Concluded.

INDUSTRIES.	Number of Establishments Considered	AMOUNT OF CAPITAL INVESTED		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percentages
Glass, . . . . .	12	\$453,862	\$476,800	+\$22,938	+5.05
Glue, isinglass, and starch, . . . . .	14	812,245	1,044,365	+232,120	+28.58
Hair work (animal and human), . . . . .	11	193,800	209,000	+15,800	+8.16
Hose: rubber, linen, etc., . . . . .	8	285,912	850,000	+564,088	+197.29
Hosiery and knit goods, . . . . .	23	3,437,597	3,619,286	+181,689	+5.29
Ink, mucilage, and paste, . . . . .	7	47,300	51,500	+4,200	+8.88
Ivory, bone, shell, and horn goods, etc., . . . . .	17	1,507,841	1,412,300	-95,541	-6.34
Leather, . . . . .	169	8,925,338	9,790,034	+864,696	+9.69
Liquors and beverages (not spirituous), . . . . .	12	167,390	177,000	+9,610	+5.74
Liquors: malt, distilled, and fermented, . . . . .	57	5,281,616	6,080,787	+849,171	+16.23
Lumber, . . . . .	24	1,110,370	1,374,185	+263,815	+23.76
Machines and machinery, . . . . .	255	17,437,283	23,514,454	+6,077,171	+34.85
Metals and metallic goods, . . . . .	268	19,070,549	22,625,517	+3,554,968	+18.64
Mixed textiles, . . . . .	11	1,196,061	1,039,340	-156,721	-13.10
Models and patterns, . . . . .	5	23,245	35,255	+12,010	+51.67
Musical instruments and materials, . . . . .	45	4,005,059	5,594,787	+1,589,728	+39.69
Oils and illuminating fluids, . . . . .	9	879,541	739,623	-139,918	-15.91
Paints, colors, and crude chemicals, . . . . .	12	679,569	964,887	+285,318	+41.99
Paper and paper goods, . . . . .	95	19,413,557	20,254,569	+841,012	+4.33
Perfumes, toilet articles, etc., . . . . .	5	109,368	145,900	+36,532	+33.40
Photographs and photographic materials, . . . . .	11	235,400	249,500	+14,100	+5.99
Polishes and dressing, . . . . .	20	754,301	848,935	+94,634	+12.55
Printing, publishing, and bookbinding, . . . . .	18	2,439,748	2,602,347	+162,599	+6.66
Print works, dye works, and bleacheries, . . . . .	39	13,423,415	13,778,245	+354,830	+2.64
Railroad construction and equipment, . . . . .	7	1,303,112	1,670,000	+366,888	+28.15
Rubber and elastic goods, . . . . .	26	10,500,129	13,370,907	+2,870,778	+27.34
Scientific instruments and appliances, . . . . .	13	623,791	1,161,850	+538,059	+86.26
Shipbuilding, . . . . .	47	790,112	1,165,185	+375,073	+47.47
Silk and silk goods, . . . . .	8	1,684,487	2,837,763	+1,153,276	+68.46
Sporting and athletic goods, . . . . .	9	235,950	267,987	+32,037	+13.58
Stone, . . . . .	120	2,841,209	3,073,049	+231,840	+8.16
Straw and palm leaf goods, . . . . .	18	1,958,779	1,868,413	-90,366	-4.61
Tallow, candles, soap, and grease, . . . . .	62	1,358,438	1,645,900	+287,462	+21.16
Tobacco, snuff, and cigars, . . . . .	38	595,270	708,269	+112,999	+18.98
Toys and games (children's), . . . . .	9	275,910	347,636	+71,726	+26.00
Trunks and valises, . . . . .	9	89,600	85,700	-3,900	-4.35
Whips, lashes, and stocks, . . . . .	11	705,648	627,309	-78,339	-11.10
Wooden goods, . . . . .	157	2,799,171	2,973,429	+174,258	+6.23
Woollen goods, . . . . .	126	25,940,182	28,056,310	+2,116,158	+8.16
Worsted goods, . . . . .	16	7,182,856	8,622,091	+1,439,235	+20.04
ALL INDUSTRIES, . . . . .	3,817	\$377,564,962	\$421,689,953	+\$44,024,991	+11.66





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## STOCK USED: BY INDUSTRIES.

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## STOCK USED: BY INDUSTRIES.

1890, 1891.

[In this presentation, the figures given under "Value of Stock Used" represent the returns made by the same establishments, in each industry, for the years 1890 and 1891, the whole number of establishments considered in "All Industries" being 3,745. Comparison is made, as regards value of stock used, between these two years. The relative increase or decrease in 1891 as compared with 1890 is given with its equivalent percentage.]

INDUSTRIES.	Number of Establishments Considered	VALUE OF STOCK USED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percentages
Agricultural implements, . . . . .	11	\$562,303	\$534,142	—\$28,161	—5.01
Arms and ammunition, . . . . .	12	510,141	580,124	+69,983	+13.72
Artisans' tools, . . . . .	56	674,214	700,444	+26,230	+3.89
Awnings, sails, tents, etc., . . . . .	30	268,775	247,559	—21,216	—7.89
Boots and shoes, . . . . .	567	54,441,633	52,619,990	—1,821,643	—3.35
Boxes (paper and wooden), . . . . .	141	2,247,097	2,403,368	+156,271	+6.95
Brick, tiles, and sewer pipe, . . . . .	45	375,304	414,147	+38,843	+10.35
Brooms, brushes, and mops, . . . . .	21	751,720	756,516	+4,796	+0.64
Burial cases, caskets, coffins, etc., . . . . .	6	202,896	210,171	+7,275	+3.59
Buttons and dress trimmings, . . . . .	17	599,939	646,657	+46,718	+7.79
Carpetings, . . . . .	12	4,831,720	5,122,453	+290,733	+6.02
Carriages and wagons, . . . . .	96	1,706,357	1,734,896	+28,539	+1.67
Cement, kaolin, lime, and plaster, . . . . .	4	58,930	53,408	—5,522	—9.37
Chemical preparations (compound- ed), . . . . .	9	577,964	445,249	—132,715	—22.96
Clocks, watches, and jewelry, . . . . .	77	1,986,429	1,912,984	—73,445	—3.70
Clothing, . . . . .	113	15,288,272	14,882,585	—405,687	—2.65
Cooking, lighting, and heating ap- paratus, . . . . .	31	1,033,748	1,023,198	—10,550	—1.02
Cordage and twine, . . . . .	25	7,154,143	7,259,147	+105,004	+1.47
Corks, bungs, and taps, . . . . .	4	30,187	29,175	—1,012	—3.35
Cotton goods, . . . . .	157	52,290,260	52,253,505	—36,755	—0.07
Cotton, woollen, and other textiles, . . . . .	3	1,832,167	2,411,371	+579,204	+31.61
Crayons, pencils, crucibles, etc., . . . . .	4	52,155	78,976	+26,821	+51.43
Drugs and medicines, . . . . .	19	1,062,786	2,042,822	+980,036	+92.21
Dyestuffs, . . . . .	7	964,357	920,731	—43,626	—4.52
Earthen, plaster, and stone ware, . . . . .	4	60,927	57,010	—3,917	—6.43
Electrical apparatus and appliances, . . . . .	5	2,616,356	5,043,629	+2,427,273	+92.77
Electroplating, . . . . .	10	18,392	23,692	+5,270	+28.65
Emery and sand paper and cloth, etc., . . . . .	13	360,631	383,648	+23,017	+6.38
Fancy articles, . . . . .	6	121,400	121,843	+443	+0.36
Fertilizers, . . . . .	7	247,807	252,746	+4,939	+1.99
Fine arts and taxidermy, . . . . .	2	1,300	1,350	—450	—25.00
Fireworks and matches, . . . . .	3	20,864	28,761	+7,897	+37.85
Flax, hemp, jute, and linen goods, . . . . .	8	2,166,228	2,205,167	+38,939	+1.80
Food preparations, . . . . .	264	51,483,954	55,512,438	+4,028,484	+7.82

## STOCK USED: BY INDUSTRIES — 1890, 1891 — Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	VALUE OF STOCK USED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Furniture, . . . . .	120	\$3,972,127	\$4,187,297	+\$215,170	+5.42
Glass, . . . . .	10	124,640	140,109	+15,469	+12.41
Glue, isinglass, and starch, . . .	14	702,203	626,404	-75,799	-10.79
Hair work (animal and human), . .	10	388,036	365,749	-22,287	-5.74
Hose: rubber, linen, etc., . . .	5	473,826	576,721	+102,896	+21.72
Hosiery and knit goods, . . . .	40	2,732,168	3,271,453	+539,285	+19.74
Ink, mucilage, and paste, . . .	8	149,516	165,971	+16,455	+11.01
Ivory, bone, shell, and horn goods, etc.,	18	227,025	272,259	+45,234	+19.92
Leather, . . . . .	154	13,959,611	11,925,222	-2,034,389	-14.57
Liquors and beverages (not spirit- uous), . . . . .	12	185,579	180,404	-5,175	-2.79
Liquors: malt, distilled, and fer- mented, . . . . .	49	2,749,268	3,150,018	+400,750	+14.58
Lumber, . . . . .	25	1,460,689	1,446,092	-13,997	-0.96
Machines and machinery, . . .	263	9,309,620	8,870,851	-438,769	-4.71
Metals and metallic goods, . . .	277	17,926,860	17,651,153	-275,707	-1.54
Mixed textiles, . . . . .	13	1,241,394	1,129,004	-112,390	-9.05
Models and patterns, . . . . .	5	23,901	32,999	+4,098	+14.18
Musical instruments and materials, .	46	2,115,603	2,018,603	-97,000	-4.58
Oils and illuminating fluids, . .	9	947,581	1,111,812	+164,231	+17.33
Paints, colors, and crude chemicals, .	16	721,657	627,212	-94,445	-13.09
Paper and paper goods, . . . .	102	14,609,690	15,680,804	+1,071,114	+7.33
Perfumes, toilet articles, etc., . .	4	104,385	116,188	+11,803	+11.31
Photographs and photographic ma- terials, . . . . .	11	82,621	83,642	+1,021	+1.24
Polishes and dressing, . . . .	18	802,042	866,054	+64,012	+7.98
Printing, publishing, and bookbind- ing, . . . . .	24	947,250	922,548	-24,702	-2.61
Print works, dye works, and bleach- eries, . . . . .	37	12,580,381	11,861,189	-719,192	-5.72
Railroad construction and equipment, .	14	1,994,640	2,091,335	+96,695	+4.85
Rubber and elastic goods, . . .	30	11,988,507	12,973,367	+984,860	+8.22
Scientific instruments and appli- ances, . . . . .	11	566,400	586,301	+19,901	+3.51
Shipbuilding, . . . . .	42	426,482	420,489	-5,993	-1.41
Silk and silk goods, . . . . .	9	3,034,351	3,033,056	-1,295	-0.04
Sporting and athletic goods, . . .	9	195,141	206,729	+11,588	+5.94
Stone, . . . . .	111	855,625	875,031	+19,406	+2.27
Straw and palm leaf goods, . . .	17	1,892,902	1,908,490	+15,588	+0.82
Tallow, candles, soap, and grease, .	55	2,364,462	2,246,098	-118,364	-5.01
Tobacco, snuff, and cigars, . . .	35	1,142,586	1,174,974	+32,389	+2.83
Toys and games (children's), . . .	8	217,774	216,981	-793	-0.36
Trunks and valises, . . . . .	7	150,944	148,182	-2,762	-1.83
Whips, lashes, and stocks, . . .	15	353,383	398,823	+45,440	+12.56
Wooden goods, . . . . .	149	2,198,339	2,352,926	+154,587	+7.03
Woollen goods, . . . . .	138	19,461,068	21,162,373	+1,701,305	+8.74
Worsted goods, . . . . .	21	10,448,643	12,220,984	+1,772,341	+16.96
ALL INDUSTRIES, . . . . .	3,745	\$352,435,774	\$362,210,369	+\$9,774,595	+2.77

## COMPARISON OF STOCK USED. SAME ESTABLISHMENTS. FOR THE YEARS 1885, 1890.

[In this presentation, the figures given under "Value of Stock Used" represent the returns made by the same establishments, in each industry, for 1890 and the Census year 1885, the whole number of establishments considered in "All Industries" being 3,817. Comparison is made, as regards the value of stock used, between these two years. The relative increase or decrease in 1890 as compared with 1885 is given with its equivalent percentage.]

INDUSTRIES.	Number of Estab- lishments Con- sidered	VALUE OF STOCK USED		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
Agricultural implements, . . .	11	\$379,874	\$562,303	+\$182,429	+48.02
Arms and ammunition, . . .	13	563,408	510,173	-53,235	-9.45
Artisans' tools, . . .	56	616,046	692,089	+76,043	+12.34
Awnings, sails, tents, etc., . . .	34	241,824	282,747	+40,923	+16.92
Boots and shoes, . . .	523	47,583,750	53,798,109	+6,214,359	+13.06
Boxes (paper and wooden), . . .	130	1,798,204	2,263,808	+465,604	+25.89
Brick, tiles, and sewer pipe, . . .	50	345,088	510,743	+165,655	+48.00
Brooms, brushes, and mops, . . .	20	247,270	241,241	-6,029	-2.44
Burial cases, caskets, coffins, etc., . . .	5	193,929	186,396	-7,433	-3.83
Buttons and dress trimmings, . . .	15	544,696	548,100	+3,404	+0.62
Carpetings, . . .	11	3,721,895	4,668,076	+946,181	+25.42
Carriages and wagons, . . .	123	1,939,089	2,726,448	+787,359	+40.60
Cement, kaolin, lime, and plaster, . . .	4	38,884	97,760	+58,876	+151.41
Chemical preparations (compound- ed), . . .	12	654,771	706,629	+51,858	+7.92
Clocks, watches, and jewelry, . . .	86	2,116,195	2,607,879	+491,684	+23.23
Clothing, . . .	126	12,331,854	15,414,345	+3,082,491	+25.00
Cooking, lighting, and heating ap- paratus, . . .	41	1,010,173	1,117,575	+107,402	+10.63
Cordage and twine, . . .	24	3,343,407	7,011,796	+3,668,389	+109.72
Corks, bungs, and taps, . . .	2	57,032	12,794	-44,238	-77.87
Cotton goods, . . .	142	36,607,021	49,673,961	+13,066,940	+35.70
Cotton, woollen, and other textiles, . . .	2	1,488,856	1,786,268	+297,412	+19.98
Crayons, pencils, crucibles, etc., . . .	3	44,232	41,671	-2,561	-5.79
Drugs and medicines, . . .	20	1,079,683	1,131,286	+51,603	+4.78
Dyestuffs, . . .	6	428,888	419,357	-9,531	-2.22
Earthen, plaster, and stone ware, . . .	5	40,722	80,927	+40,205	+98.73
Electrical apparatus and appliances, . . .	4	320,130	2,612,856	+2,292,726	+716.19
Electroplating, . . .	10	29,471	23,396	-6,075	-20.61
Emery and sand paper and cloth, etc., . . .	10	213,089	317,830	+104,791	+49.19
Fancy articles, . . .	5	12,696	39,480	+26,784	+210.96
Fertilizers, . . .	6	60,568	77,651	+17,083	+28.20
Fine arts and taxidermy, . . .	3	1,000	2,155	+1,155	+115.50
Fireworks and matches, . . .	2	9,067	10,684	+1,627	+17.96
Flax, hemp, jute, and linen goods, . . .	8	1,463,415	2,166,228	+702,813	+48.03
Food preparations, . . .	832	43,171,157	56,772,985	+13,601,828	+29.19
Furniture, . . .	150	3,717,461	4,261,754	+544,293	+14.37

## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF STOCK USED: SAME ESTABLISHMENTS.  
FOR THE YEARS 1885, 1890 — Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	VALUE OF STOCK USED		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
Glass, . . . . .	12	\$191,198	\$167,758	-\$23,440	-12.26
Glue, isinglass, and starch, . . . . .	14	591,604	620,788	+29,184	+4.93
Hair work (animal and human), . . . . .	11	276,868	391,636	+114,773	+41.45
Hose: rubber, linen, etc., . . . . .	3	259,006	414,191	+155,185	+59.92
Hosiery and knit goods, . . . . .	23	1,641,215	2,356,619	+715,404	+43.59
Ink, mucilage, and paste, . . . . .	7	60,530	55,206	-5,324	-8.80
Ivory, bone, shell, and horn goods, etc., . . . . .	17	276,877	492,703	+215,826	+77.95
Leather, . . . . .	169	14,951,966	15,137,926	+185,960	+1.24
Liquors and beverages (not spirit- uous), . . . . .	12	98,765	185,579	+86,814	+87.90
Liquors: malt, distilled, and fer- mented, . . . . .	57	3,257,372	2,959,890	-297,982	-9.15
Lumber, . . . . .	24	974,372	1,262,889	+288,517	+29.61
Machines and machinery, . . . . .	255	5,106,068	8,935,297	+3,829,229	+75.97
Metals and metallic goods, . . . . .	268	11,810,600	17,229,077	+5,418,477	+45.88
Mixed textiles, . . . . .	11	867,161	1,213,940	+346,779	+39.99
Models and patterns, . . . . .	5	26,129	28,901	+2,772	+10.61
Musical instruments and materials, . . . . .	45	1,789,242	2,698,961	+909,719	+50.84
Oils and illuminating fluids, . . . . .	9	1,231,257	947,581	-283,676	-23.04
Paints, colors, and crude chemicals, . . . . .	12	454,732	529,112	+74,380	+16.36
Paper and paper goods, . . . . .	95	11,857,538	13,471,429	+1,613,891	+13.61
Perfumes, toilet articles, etc., . . . . .	5	72,780	94,845	+22,065	+30.32
Photographs and photographic ma- terials, . . . . .	11	66,937	120,206	+53,269	+79.58
Polishes and dressing, . . . . .	20	730,953	814,412	+83,459	+11.42
Printing, publishing, and bookbind- ing, . . . . .	18	510,529	566,648	+56,119	+10.99
Print works, dye works, and bleach- eries, . . . . .	39	13,220,037	13,081,025	-139,012	-1.05
Railroad construction and equipment	7	824,572	1,429,052	+604,480	+73.31
Rubber and elastic goods, . . . . .	26	7,207,103	11,901,129	+4,694,026	+65.13
Scientific instruments and appli- ances, . . . . .	13	506,023	640,105	+134,082	+26.50
Shipbuilding, . . . . .	47	387,141	591,229	+204,088	+52.72
Silk and silk goods, . . . . .	8	2,006,512	3,193,518	+1,187,006	+59.16
Sporting and athletic goods, . . . . .	9	192,280	192,061	-219	-0.11
Stone, . . . . .	120	1,057,923	915,236	-142,687	-13.49
Straw and palm leaf goods, . . . . .	18	2,805,117	2,512,584	-292,533	-10.43
Tallow, candles, soap, and grease, . . . . .	62	2,344,071	2,428,295	+84,224	+3.59
Tobacco, snuff, and cigars, . . . . .	38	713,461	1,124,711	+411,250	+57.64
Toys and games (children's), . . . . .	9	113,029	222,168	+109,139	+96.56
Trunks and valises, . . . . .	9	134,864	155,004	+20,140	+14.93
Whips, lashes, and stocks, . . . . .	11	209,165	314,273	+105,108	+50.25
Wooden goods, . . . . .	157	2,070,353	2,349,787	+279,434	+13.50
Woollen goods, . . . . .	126	16,012,384	19,157,999	+3,145,615	+19.64
Worsted goods, . . . . .	16	5,507,333	7,828,273	+2,320,940	+42.14
ALL INDUSTRIES, . . . . .	3,817	\$278,830,247	\$351,149,543	+\$72,319,296	+25.94

## COMPARISON OF QUANTITIES AND VALUES OF STOCK USED.

1890, 1891.

[In this presentation articles of stock used by the same establishments are shown for 1890 and 1891. For instance, the quantity and value of acetic acid used in 1890 in certain establishments are compared with the returns of the same establishments for 1891. The quantity of stock given does not, in any instance, represent the *total* amount used in the State. The figures given in the table below are derived solely from the returns of those establishments which reported the quantities and values of stock used for 1890 and 1891, upon the same basis for both years, thus admitting of direct comparison. The order is alphabetical, with subsidiary classifications under such general titles as brass, bristles, cotton, etc. To avoid the use of small amounts in the "Average Price per Basis" columns, the units of measurement returned by the manufacturers have been increased when necessary; as, for instance, single pounds have been

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Acid, acetic . . . .	100 pounds	3,206	\$5,097	3,706	\$5,742
2	Acid, muriatic . . . .	100 pounds	616	814	534	726
3	Acid, sulphuric . . . .	100 pounds	7,429	6,876	10,505	9,083
4	Acid, sulphuric . . . .	carboys	314	592	354	967
5	Actions, piano . . . .	sets	7,583	139,241	6,855	132,582
6	Alcohol, grain . . . .	gallons	22,283	52,875	30,985	66,883
7	Ale, . . . .	barrels	2,640	18,480	1,040	6,320
8	Ammonia, sulphate of . . . .	100 pounds	1,874	5,917	1,830	5,840
9	Apples, cider . . . .	bushels	211,597	68,591	365,523	58,557
10	Ashes, wood . . . .	bushels	17,050	4,073	15,575	4,110
11	Axles, . . . .	sets	5,367	21,862	4,947	20,441
12	Bagging, . . . .	tons	6,234	185,815	6,746½	172,593
13	Bark, hemlock . . . .	cords	50,484	484,224	48,264	488,127
14	Bark, hemlock (extract of), . . . .	pounds	173,208	4,464	52,953	1,600
15	Bark, hemlock (extract of), . . . .	barrels	2,625	33,245	2,048	26,082
16	Barley, . . . .	bushels	65,000	60,000	62,830	62,830
17	Beef, dressed . . . .	100 pounds	4,660	22,840	6,277	27,006
18	Beeswax, . . . .	pounds	6,780	2,084	6,581	2,123
19	Bellies, leather . . . .	tons	246	53,000	188½	36,330
20	Bleach, . . . .	tons	392	13,720	392	13,740
21	Boards, box . . . .	M feet	5,133	49,837	5,960	55,020
22	Boards, box (pine), . . . .	M feet	10,043	102,018	10,351	104,053
23	Boards, pine . . . .	M feet	15,535	163,921	15,088	164,880
24	Bodies, carriage . . . .	.	3,624	42,086	3,439	40,842
25	Bones, green (or raw), . . . .	tons	6,523½	104,149	6,763½	116,164
26	Borax, . . . .	100 pounds	767	6,745	770	6,632
	Brass:					
27	Cast, . . . .	100 pounds	37	959	36	913
28	Ingot, . . . .	100 pounds	166	1,983	263	2,836
29	Old, . . . .	100 pounds	9,000	72,000	3,000	28,500

## COMPARISON OF QUANTITIES AND VALUES OF STOCK USED.

1890, 1891.

increased to 100 pounds or to tons, single feet to 1,000 feet, single yards to 100 yards, etc. The price per single pound, single foot, single yard, etc., may be readily obtained by dividing the figures given by 100, 1,000, etc. The method of reading this table is as follows: In 1890, a certain number of establishments used 320,800 pounds of acetic acid and in 1891, these same establishments used 370,600 pounds; this was an increase of 50,000 pounds, or 15.60 per cent. The value of the quantity used in 1890 was \$5,097; in 1891 it amounted to \$5,742 an increase of \$645, or 12.65 per cent. The average price per 100 pounds was \$1.59 in 1890, and \$1.55 in 1891, a decrease of \$0.04, or 2.52 per cent. The italic letters *n. s.*, denote the abbreviation of the words "not specified." Attention is called to the foot-notes which specify cases of indefiniteness in the designation of various kinds of stock used.]

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+500	+15.60	+\$645	+12.65	\$1.59	\$1.55	-\$0.04	-2.52	1
-82	-13.31	-88	-10.81	1.32	1.36	+0.04	+3.03	2
+3,076	+41.41	+2,207	+82.10	0.93	0.86	-0.07	-7.53	3
+40	+12.74	+375	+63.34	1.89	2.73	+0.84	+44.44	4
-728	-9.60	-6,659	-4.78	18.36	19.34	+0.98	+5.34	5
+8,702	+39.05	+14,008	+26.49	2.37	2.16	-0.21	-8.86	6
-1,600	-60.61	-12,160	-65.80	7.00	6.08	-0.92	-13.14	7
-44	-2.35	-77	-1.30	3.16	3.19	+0.03	+0.95	8
+153,926	+72.74	-10,034	-14.63	0.32	0.16	-0.16	-50.00	9
-1,475	-8.65	+37	+0.91	0.24	0.26	+0.02	+8.33	10
-420	-7.83	-1,421	-6.50	4.07	4.13	+0.06	+1.47	11
+512½	+8.22	-13,222	-7.12	29.81	25.58	-4.23	-14.19	12
-2,220	-4.40	+3,903	+0.81	9.59	10.11	+0.52	+5.42	13
-120,255	-69.43	-2,864	-64.16	0.03	0.03	=	=	14
-577	-21.98	-7,163	-21.55	12.66	12.74	+0.08	+0.63	15
-2,170	-3.34	+2,830	+4.72	0.92	1.00	+0.08	+8.70	16
+1,587	+33.84	+4,166	+18.24	4.87	4.30	-0.57	-11.70	17
-199	-2.94	+39	+1.87	0.31	0.32	+0.01	+3.23	18
-57½	-23.37	-16,670	-31.45	215.45	192.73	-22.72	-10.55	19
=	=	+20	+0.15	35.00	35.05	+0.05	+0.14	20
+827	+16.11	+5,183	+10.40	9.71	9.23	-0.48	-4.94	21
+303	+3.07	+2,035	+1.99	10.16	10.05	-0.11	-1.08	22
-447	-2.88	-9,041	-5.52	10.55	10.27	-0.28	-2.65	23
-186	-5.10	-1,744	-4.14	11.61	11.73	+0.12	+1.03	24
+240½	+3.69	+12,015	+11.54	15.97	17.17	+1.20	+7.51	25
+3	+0.39	-113	-1.68	8.79	8.61	-0.18	-2.05	26
-1	-2.70	-46	-4.80	25.92	25.36	-0.56	-2.16	27
+97	+58.43	+853	+43.02	11.95	10.78	-1.17	-9.79	28
-6,000	-66.67	-43,500	-60.42	8.00	9.50	+1.50	+18.75	29

<sup>1</sup> No change in average price.

<sup>2</sup> No change in quantity used.



## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890.		1891	
			Quantity	Value	Quantity	Value
	Brass: — Con.					
1	Pig, . . . . .	100 pounds	150	\$1,500	60	\$595
2	Rolled, . . . . .	100 pounds	634	8,987	587	8,800
3	Sheet, . . . . .	tons	404	139,507	448½	140,522
4	Brass, n. s.,* . . . .	tons	680½	211,294	486	158,442
5	Brimstone, . . . . .	tons	466	10,604	367½	8,768
	Bristles:					
6	American, . . . . .	100 pounds	222	12,100	252	13,100
7	French, . . . . .	100 pounds	15	1,350	25	2,000
8	German, . . . . .	100 pounds	110	14,350	123	17,125
9	Hogs', . . . . .	100 pounds	450	39,000	465	40,000
10	Russian, . . . . .	100 pounds	58	9,510	52	10,600
11	Bristles, n. s.,* . . . .	100 pounds	2,695	331,000	2,762	335,500
12	Broadcloth, . . . . .	100 yards	219	26,089	243	28,824
13	Broom corn, . . . . .	tons	186	18,821	245	22,794
14	Buckles, . . . . .	gross	56,500	75,330	58,700	82,100
15	Butter, . . . . .	100 pounds	4,518	76,575	4,685	79,890
16	Button-board, . . . . .	tons	140½	9,647	161½	11,208
17	Calves, . . . . .		17,564	91,970	15,877	107,957
18	Camel's-hair, . . . . .	100 pounds	18,576	355,586	17,825	226,002
19	Cane, chair . . . . .	bales	1,914	66,397	2,084	71,047
20	Cases, piano . . . . .		2,835	125,020	2,460	101,038
21	Castings, brass . . . . .	pounds	402,704½	78,396	422,371	76,255
22	Castings, composition . .	100 pounds	966	20,594	1,121	23,905
23	Castings, iron . . . . .	tons	10,321¼	612,349	11,255½	635,256
24	Cattle, . . . . .		1,963	87,971	1,445	59,150
25	Chalk, . . . . .	tons	5,000	17,000	4,985	16,940
26	Chocolate, . . . . .	100 pounds	8,779	194,241	8,367	183,371
27	Clay, china . . . . .	tons	2,082½	31,609	2,360	39,488
28	Clips, woollen . . . . .	100 pounds	16,513	160,385	19,907	200,981
29	Cloth, cotton . . . . .	100 yards	149,939	1,178,746	166,134	1,211,767
30	Cloth, cotton (gray), . .	100 yards	171,512	641,328	218,665	706,131
31	Coal, . . . . .	tons	77,498½	371,690	90,747	436,229
32	Codfish, fresh . . . . .	100 pounds	19,137	55,904	14,575	34,020
33	Coffee, green . . . . .	100 pounds	134,544	2,512,374	151,481	2,790,921
34	Coke, . . . . .	tons	2,519½	14,274	2,283¾	13,481
35	Copper,* . . . . .	tons	2,496½	713,893	1,972	500,245
36	Copper, ingot . . . . .	100 pounds	54,250	808,194	46,562	657,282
37	Copper, sheet . . . . .	100 pounds	1,120	27,373	1,286	28,185
38	Corn, Indian . . . . .	100 bushels	52,390	3,014,803	44,685	2,915,758
39	Corundum, rough . . . .	tons	1,662	86,320	1,826	92,187
	Cotton:					
40	Raw, . . . . .	100 pounds	2,185,870	23,326,701	2,261,594	22,235,743
41	Raw (American), . . . .	100 pounds	101,656	1,204,215	108,147	1,235,832
42	Raw (Egyptian), . . . .	100 pounds	18,041	205,173	17,665	248,992

\* Not specified as to particular kind.

## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
-90	-60.00	-906	-60.33	\$10.00	\$9.92	-\$0.08	-0.80	1
-47	-7.41	-187	-2.08	14.18	14.99	+0.81	+5.71	2
+44½	+11.01	+1,815	+0.73	345.31	313.32	-31.99	-9.26	3
-194½	-28.56	-52,852	-25.01	310.61	326.01	+15.40	+4.96	4
-98½	-21.14	-1,336	-17.31	22.76	23.86	+1.10	+4.83	5
+30	+13.51	+1,000	+8.26	54.50	51.98	-2.52	-4.62	6
+10	+66.67	+650	+48.15	90.00	80.00	-10.00	-11.11	7
+13	+11.82	+2,275	+15.32	135.00	139.23	+4.23	+3.13	8
+15	+3.33	+1,000	+2.56	86.67	86.02	-0.65	-0.75	9
-6	-10.34	+1,090	+11.46	163.97	203.85	+39.88	+24.32	10
+67	+2.49	+4,500	+1.36	122.82	121.47	-1.35	-1.10	11
+24	+10.96	+2,735	+10.48	119.13	118.62	-0.51	-0.43	12
+59	+31.72	+3,973	+21.11	101.19	93.04	-8.15	-8.05	13
+2,200	+3.89	+6,770	+8.99	1.33	1.40	+0.07	+5.26	14
+187	+3.70	+3,315	+4.33	16.96	17.05	+0.10	+0.59	15
+21	+14.95	+1,561	+16.18	68.66	69.40	+0.74	+1.08	16
-1,687	-9.60	+15,987	+17.38	5.24	6.80	+1.56	+29.77	17
-751	-4.04	-129,584	-36.44	19.14	12.68	-6.46	-33.75	18
+170	+8.81	+4,650	+7.00	34.69	34.09	-0.60	-1.73	19
-375	-13.23	-23,982	-19.18	44.10	41.07	-3.03	-6.87	20
+19,666½	+4.88	-2,141	-2.73	0.19	0.18	-0.01	-5.26	21
+155	+16.05	+3,311	+16.08	21.32	21.32	=	=	22
+934½	+9.05	+22,907	+3.74	59.53	56.44	-2.89	-4.87	23
-518	-26.39	-28,821	-32.76	44.81	40.98	-3.58	-8.66	24
-15	-0.30	-60	-0.35	3.40	3.40	=	=	25
-412	-4.69	-10,870	-5.60	22.13	21.92	-0.21	-0.95	26
+277½	+13.33	+7,879	+24.93	15.18	16.73	+1.55	+10.21	27
+3,394	+20.55	+40,596	+25.31	9.71	10.10	+0.39	+4.02	28
+16,195	+10.80	+33,021	+2.80	7.86	7.29	-0.57	-7.25	29
+47,153	+27.49	+64,803	+10.10	3.74	3.23	-0.51	-13.64	30
+13,248½	+17.10	+64,539	+17.36	4.80	4.81	+0.01	+0.21	31
-4,562	-23.84	-21,884	-39.15	2.92	2.33	-0.59	-20.21	32
+16,937	+12.59	+278,547	+11.09	18.67	18.42	-0.25	-1.34	33
-235½	-9.36	-793	-5.56	5.67	5.90	+0.23	+4.06	34
-524½	-21.00	-213,648	-29.93	285.99	253.67	-32.32	-11.30	35
-7,088	-14.17	-150,912	-18.67	14.90	14.12	-0.78	-5.23	36
+166	+14.82	+812	+2.97	24.44	21.92	-2.52	-10.31	37
-7,705	-14.71	-99,045	-3.29	57.55	62.25	+4.70	+8.17	38
+164	+9.87	+5,867	+6.80	51.94	50.49	-1.45	-2.79	39
+75,724	+3.46	-1,090,958	-4.68	10.67	9.83	-0.84	-7.87	40
+6,491	+6.39	+31,667	+2.63	11.85	11.43	-0.42	-3.54	41
+4,624	+35.46	+43,819	+21.36	15.73	14.10	-1.63	-10.36	42

1 No change in average price.

## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
	Cotton:—Con.					
1	Raw (Sea Island), . .	100 pounds	15,127	\$375,985	14,709	\$334,955
2	Raw (Southern), . .	100 pounds	1,293,960	13,757,447	1,420,323	13,697,005
3	Raw (Texas), . .	100 pounds	28,103	309,424	29,658	324,363
4	Cream of tartar, . .	100 pounds	12,743	320,945	15,087	351,779
5	Duck, cotton . . . .	100 pounds	21,459	422,672	24,475	477,582
6	Duck, cotton (for sails), . .	100 yards	3,349	115,900	3,457	122,701
7	Eggs, . . . . .	dozen	308,824	63,130	328,082	64,979
8	Flax, . . . . .	100 pounds	38,606	666,897	38,736	670,812
9	Flocks, . . . . .	100 pounds	4,700	32,765	5,370	34,926
10	Flour (for paste), . . .	barrels	84,403	130,294	82,860	142,375
11	Flour, wheat . . . .	barrels	198,747	1,030,709	197,142	1,017,662
12	Gambier, . . . . .	100 pounds	2,800	19,771	2,962	17,946
13	Gambier, . . . . .	bales	2,339	35,708	1,907	25,171
14	Glucose, . . . . .	100 pounds	22,774	61,895	18,820	50,486
15	Glue, . . . . .	100 pounds	3,456	47,287	3,449	49,445
16	Glue, . . . . .	barrels	187	3,036	170	3,396
17	Glycerine, . . . . .	100 pounds	1,093	18,324	1,151	17,243
18	Gold, . . . . .	ounces	11,120	228,276	11,087	226,664
19	Gold leaf, . . . . .	packs	2,717	20,151	2,265	16,840
20	Granite,* . . . . .	cubic feet	74,385	67,857	78,610	70,635
21	Granite, rough . . . .	tons	2,610	20,458	2,442	22,066
	Grease:					
22	Curriers', . . . . .	100 pounds	13,172	58,813	17,561	75,831
23	Curriers', . . . . .	barrels	2,055	29,820	1,917	29,499
24	Rendered, . . . . .	100 pounds	33,587	130,067	33,825	137,645
25	Rough, . . . . .	100 pounds	21,134	41,404	21,783	46,007
26	Hair, cattle . . . . .	tons	1,021½	20,290	1,162½	25,668
	Hemp:					
27	Manila, . . . . .	tons	9,583½	1,881,522	7,886½	1,494,726
28	New Zealand, . . . .	tons	4,574½	567,530	5,965½	660,653
29	Russian, . . . . .	tons	100	15,417	230½	34,715
30	Sisal, . . . . .	tons	5,301½	568,536	6,781½	794,423
31	Hemp, n. s.,* . . . .	tons	6,292½	1,124,786	7,815½	1,485,044
	Hides:					
32	Dry, . . . . .	. .	29,752	40,154	23,337	35,059
33	Green, . . . . .	. .	27,571	84,628	23,875	76,882
34	Green (salted), . . . .	. .	102,420	383,189	117,020	383,207
35	Green (salted), . . . .	100 pounds	38,413	233,406	71,978	460,150
36	Salted, . . . . .	. .	69,983	191,978	54,627	130,573
37	Hides, n. s.,* . . . .	. .	126,403	347,160	159,550	409,217
38	Hides, n. s.,* . . . .	100 pounds	24,050	154,775	14,640	89,698

\* Not specified as to particular kind.

**STOCK USED: BY INDUSTRIES — Continued.**  
**COMPARISON OF QUANTITIES AND VALUES OF STOCK USED**  
**— 1890, 1891 — Continued.**

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
-418	-2.76	-\$41,030	-10.91	\$24.86	\$22.77	-\$2.09	-8.41	1
+126,363	+9.77	-60,442	-0.44	10.63	9.64	-0.99	-9.31	2
+1,555	+5.53	+14,939	+4.83	11.01	10.94	-0.07	-0.64	3
+2,344	+18.89	+30,834	+9.61	25.19	23.32	-1.87	-7.42	4
+3,016	+14.05	+54,910	+12.99	19.70	19.51	-0.19	-0.96	5
+108	+3.22	+6,801	+5.87	34.61	35.49	+0.88	+2.54	6
+19,258	+6.24	+1,849	+2.93	0.20	0.20	<sup>1</sup> =	<sup>1</sup> =	7
+130	+0.34	+3,915	+0.59	17.27	17.32	+0.05	+0.29	8
+670	+14.26	+2,161	+6.60	6.97	6.50	-0.47	-6.74	9
-1,543	-4.49	+12,081	+9.27	8.79	4.33	+0.54	+14.25	10
-1,605	-0.81	-13,047	-1.27	5.19	5.16	-0.03	-0.58	11
+162	+5.79	-1,825	-9.23	7.06	6.06	-1.00	-14.16	12
-432	-18.47	-10,537	-29.51	15.27	13.20	-2.07	-13.56	13
-3,954	-17.36	-11,409	-18.43	2.72	2.68	-0.04	-1.47	14
-7	-0.20	+2,158	+4.56	13.68	14.34	+0.66	+4.82	15
+3	+1.80	+360	+11.86	18.18	19.98	+1.80	+9.90	16
+58	+5.31	-1,081	-5.90	16.76	14.98	-1.78	-10.62	17
-33	-0.30	-1,612	-0.71	20.53	20.44	-0.09	-0.44	18
-452	-16.64	-3,811	-16.43	7.42	7.43	+0.01	+0.13	19
+4,225	+5.68	+2,778	+4.09	0.91	0.90	-0.01	-1.10	20
-168	-6.44	+1,608	+7.86	7.84	9.04	+1.20	+15.31	21
+4,389	+33.32	+17,018	+28.94	4.47	4.32	-0.15	-3.86	22
-138	-6.72	-321	-1.08	14.51	15.39	+0.88	+6.06	23
+238	+0.71	+7,578	+5.83	3.87	4.07	+0.20	+5.17	24
+649	+3.07	+4,603	+11.12	1.96	2.11	+0.15	+7.65	25
+140%	+13.77	+5,369	+26.45	19.87	22.09	+2.22	+11.17	26
-1,697	-17.71	-386,796	-20.58	196.34	189.54	-6.80	-3.46	27
+1,391%	+30.42	+98,123	+16.41	124.07	110.75	-13.32	-10.74	28
+130%	+130.88	+19,298	+125.17	154.17	150.36	-3.81	-2.47	29
+1,480%	+27.92	+230,887	+40.97	106.30	117.14	+10.84	+10.20	30
+1,523%	+24.21	+360,258	+32.03	178.76	190.01	+11.25	+6.29	31
-6,415	-21.56	-5,095	-12.69	1.35	1.50	+0.15	+11.11	32
-3,696	-3.41	-7,746	-9.15	3.07	3.22	+0.15	+4.89	33
+14,600	+14.26	+18	<sup>2</sup> =	3.74	3.27	-0.47	-12.57	34
+33,565	+87.38	+226,744	+97.15	6.08	6.39	+0.31	+5.10	35
-15,356	-21.94	-61,405	-31.99	2.74	2.39	-0.35	-12.77	36
+33,147	+26.22	+62,057	+17.88	2.75	2.56	-0.19	-6.91	37
-9,410	-39.13	-65,077	-42.05	6.44	6.13	-0.31	-4.81	38

<sup>1</sup> No change in average price.<sup>2</sup> Less than one one-hundredth of one per cent.

## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Hogs, . . . . .	.	1,252,158	\$15,293,187	1,582,614	\$20,147,652
2	Hops, . . . . .	100 pounds	14,115	242,862	13,095	319,786
3	Horns, cattle . . . . .	thousand	1,975	71,803	1,850	66,300
4	Indigo, . . . . .	100 pounds	1,734	192,622	1,599	183,726
	Iron:					
5	Angle, . . . . .	tons	1,504½	65,318	2,252¼	94,655
6	Bar, . . . . .	tons	3,492½	149,273	3,387½	157,134
7	Cast, . . . . .	tons	10,457½	565,347	9,914½	623,186
8	Galvanized, . . . . .	tons	71½	6,990	86½	7,731
9	Gray, . . . . .	tons	644½	24,704	691	23,590
10	Hoop, . . . . .	tons	287½	18,863	297½	18,221
11	Malleable, . . . . .	tons	542½	67,171	525½	63,216
12	Old, . . . . .	tons	1,773	25,810	2,126½	31,671
13	Pig, . . . . .	tons	92,595½	1,810,429	98,120½	1,823,548
14	Scrap, . . . . .	tons	44,214½	654,414	47,553	795,360
15	Sheet, . . . . .	tons	2,861½	234,647	2,172½	181,067
16	Wrought, . . . . .	tons	5,113	297,746	6,006	349,497
17	Iron, n. s.,* . . . . .	tons	38,970½	1,128,005	39,659	1,095,450
18	Jute, . . . . .	100 pounds	11,483	40,322	15,643	48,284
19	Keys, organ . . . . .	sets	2,700	5,424	2,925	5,890
20	Lard, . . . . .	100 pounds	43,837	271,135	48,299	312,816
21	Lead, . . . . .	100 pounds	14,461	72,899	14,393	70,652
	Leather:					
22	Belt, . . . . .	100 pounds	5,249	161,089	4,836	148,034
23	Calfskin, . . . . .	100 pounds	1,142	56,100	883	48,502
24	Enamelled (for carriages),	100 feet	2,392	44,035	2,864	44,667
25	Kid, . . . . .	100 feet	2,482	58,635	3,142	71,321
26	Rough, . . . . .	100 pounds	21,620	313,553	13,083	194,881
27	Rough, . . . . .	sides	867,295	2,022,901	454,166	949,180
28	Scrap, . . . . .	tons	5,169½	309,850	4,811	283,131
29	Sole, . . . . .	100 pounds	540,472	10,647,428	506,062	9,704,522
30	Sole, . . . . .	sides	314,557	926,152	215,611	569,865
31	Split (rough), . . . . .	tons	2,034½	463,039	1,815½	388,580
32	Upper, . . . . .	100 pounds	34,739	777,695	30,995	675,030
33	Upper, . . . . .	100 feet	621,376	8,450,535	606,582	8,216,286
34	Leather, n. s.,* . . . . .	100 pounds	31,571	521,738	25,702	429,131
35	Leather, n. s.,* . . . . .	100 feet	6,644	95,951	7,165	102,320
36	Leather, n. s.,* . . . . .	sides	58,561	118,958	41,353	87,740
37	Leather-board, . . . . .	tons	604½	45,098	636½	46,564
	Lumber:					
38	Ash, . . . . .	M feet	1,226	36,774	1,164	32,924
39	Chestnut, . . . . .	M feet	3,325	57,936	3,978	71,381

\* Not specified as to particular kind.

## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+330,456	+26.39	+44,854,465	+81.74	\$12.21	\$12.73	+40.52	+4.26	1
-1,020	-7.23	+76,924	+81.67	17.21	24.42	+7.21	+41.89	2
-125	-6.83	-5,503	-7.66	36.36	35.84	-0.52	-1.43	3
-135	-7.79	-8,896	-4.62	111.09	114.90	+3.81	+3.43	4
+747½	+49.70	+29,337	+44.91	43.42	42.03	-1.39	-3.20	5
-105½	-3.02	+7,861	+5.27	42.74	46.39	+3.65	+8.54	6
-543	-5.19	-42,161	-7.46	54.06	52.77	-1.29	-2.39	7
+15½	+21.29	+741	+10.60	97.59	88.99	-8.60	-8.81	8
+46½	+7.21	-1,114	-4.51	38.33	34.14	-4.19	-10.93	9
+9½	+3.30	-642	-3.40	65.58	61.32	-4.26	-6.50	10
-16½	-3.11	-3,955	-5.89	123.85	120.30	-3.55	-2.87	11
+353½	+19.96	+6,361	+25.13	14.28	14.89	+0.61	+4.27	12
+5,525½	+5.97	+13,119	+0.72	19.55	18.58	-0.97	-4.96	13
+3,388½	+7.55	+140,946	+21.54	14.80	16.73	+1.93	+13.04	14
-688½	-24.07	-53,580	-22.83	82.00	83.34	+1.34	+1.63	15
+893	+17.47	+51,751	+17.38	58.23	58.19	-0.04	-0.07	16
+688½	+1.77	-32,555	-2.89	28.95	27.62	-1.33	-4.59	17
+4,100	+36.23	+7,962	+19.75	3.51	3.09	-0.42	-11.97	18
+225	+8.33	+406	+8.59	2.01	2.01	=	=	19
+4,462	+10.13	+41,681	+15.37	6.19	6.48	+0.29	+4.68	20
-68	-0.47	-2,247	-3.08	5.04	4.91	-0.13	-2.58	21
-413	-7.87	-13,055	-8.10	30.69	30.61	-0.08	-0.26	22
-259	-22.68	-7,598	-13.54	49.12	54.93	+5.81	+11.83	23
+472	+19.73	+632	+1.44	18.41	15.60	-2.81	-15.26	24
+660	+26.59	+12,686	+21.64	23.62	22.70	-0.92	-3.90	25
-8,537	-39.49	-118,672	-37.85	14.50	14.90	+0.40	+2.76	26
-413,129	-47.63	-1,073,721	-53.08	2.33	2.09	-0.24	-10.30	27
-358½	-6.94	-26,719	-8.62	59.94	58.85	-1.09	-1.82	28
-34,410	-6.35	-942,906	-8.86	19.70	19.18	-0.52	-2.64	29
-98,946	-31.46	-356,287	-38.47	2.94	2.64	-0.30	-10.29	30
-219†	-10.77	-74,459	-16.08	227.57	214.02	-13.55	-5.95	31
-3,794	-10.91	-102,665	-13.20	22.35	21.78	-0.57	-2.55	32
-14,794	-2.38	-234,249	-2.77	13.60	13.55	-0.05	-0.37	33
-5,869	-18.59	-92,607	-17.75	16.53	16.70	+0.17	+1.03	34
+521	+7.84	+6,369	+6.64	14.44	14.28	-0.16	-1.11	35
-17,208	-29.38	-31,218	-26.24	2.03	2.12	+0.09	+4.43	36
+32	+5.29	+1,466	+3.25	74.60	73.16	-1.44	-1.93	37
-62	-5.06	-3,850	-10.47	30.00	28.29	-1.71	-5.70	38
+653	+19.64	+13,395	+23.12	17.42	17.93	+0.51	+2.93	39

† One-twelfth.

¹ No change in average price.

## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
	Lumber:—Con.					
1	Oak, . . . . .	M feet	1,363½	\$46,092	1,272	\$41,557
2	Pine, . . . . .	M feet	27,174½	390,546	26,538½	384,864
3	Spruce, . . . . .	M feet	2,561	42,096	3,062	49,554
4	Whitewood, . . . . .	M feet	2,196	70,707	2,258	75,353
5	Malt, . . . . .	100 bushels	10,616	906,533	10,956	1,009,343
6	Meal, corn . . . . .	100 pounds	7,793	11,159	6,301	9,138
7	Molasses, . . . . .	100 gallons	16,023	401,395	15,997	329,476
8	Molasses (for rum), . . . . .	100 gallons	6,076	95,575	8,843	111,123
9	Nails,* . . . . .	100 pounds	5,424	17,440	4,280	14,574
10	Naphtha, . . . . .	100 gallons	1,193	10,446	1,129	9,950
11	Oats, . . . . .	100 bushels	1,644	71,791	1,406	71,372
	Oil:					
12	Curriers*, . . . . .	100 gallons	409	9,084	401	8,281
13	Curriers*, . . . . .	barrels	2,541	34,922	1,887	27,551
14	Linseed, . . . . .	100 gallons	1,735	97,237	1,943	94,543
15	Linseed (raw), . . . . .	barrels	1,360	35,806	1,710	42,750
16	Palm, . . . . .	pounds	261,314	13,178	280,938	14,062
17	Oils, essential . . . . .	pounds	2,630	6,053	3,234	6,757
18	Ore, iron . . . . .	tons	9,480	38,284	17,802	69,809
19	Paper, alumen . . . . .	reams	255	8,505	256	9,390
20	Paper, old . . . . .	tons	25,279	1,431,980	22,616	1,516,774
21	Paste, . . . . .	barrels	687	1,370	733	1,518
22	Plate, rolled . . . . .	ounces	4,267	7,457	4,857	7,254
23	Plate, steel . . . . .	tons	1,124	49,804	899	39,998
24	Plate, tack . . . . .	tons	2,938	125,243	1,528	65,714
25	Plates, dry . . . . .	dozen	5,800	9,906	6,250	10,700
26	Plumbago, . . . . .	tons	1,952½	120,126	3,015	164,812
27	Plush, . . . . .	yards	20,806	35,300	20,400	31,500
28	Pork, . . . . .	100 pounds	13,944	70,838	11,982	71,278
29	Potash, . . . . .	tons	254½	23,445	278	27,043
30	Pulp, wood . . . . .	tons	31,890	1,267,179	47,610	1,990,437
31	Pulp-board, . . . . .	tons	193	8,982	334	13,980
32	Rags, old (for paper), . . . . .	tons	55,089½	3,044,799	57,119½	3,007,932
33	Rags, woollen (for shoddy), . . . . .	tons	3,689	462,596	3,568½	439,146
34	Rails, iron (old), . . . . .	tons	9,576	239,650	7,700	184,520
35	Rattan, . . . . .	100 pounds	78,512	667,970	79,566	640,220
36	Rice, . . . . .	100 pounds	20,070	51,738	23,351	60,610
37	Rivet-rods, iron (Norway), . . . . .	tons	1,906	118,680	1,752	107,481
38	Rivets, iron . . . . .	100 pounds	932	3,929	1,375	6,170
39	Rods, wire . . . . .	tons	4,148	197,757	4,427	213,005

\* Not specified as to particular kind.

## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
-91½	-6.71	-\$4,585	-9.84	\$33.80	\$32.67	-\$1.13	-3.34	1
-636	-2.34	-5,682	-1.45	14.37	14.50	+0.13	+0.90	2
+501	+19.56	+7,458	+17.72	16.44	16.18	-0.26	-1.58	3
+62	+2.82	+4,646	+6.57	32.20	33.37	+1.17	+3.63	4
+340	+3.20	+102,810	+11.34	85.39	92.13	+6.74	+7.89	5
-1,492	-19.15	-2,021	-18.11	1.43	1.45	+0.02	+1.40	6
-26	-0.16	-71,919	-17.92	25.05	20.60	-4.45	-17.76	7
+2,767	+45.54	+15,548	+16.27	15.73	12.57	-3.16	-20.09	8
-1,144	-21.09	-2,866	-16.43	3.22	3.41	+0.19	+5.90	9
-64	-5.36	-496	-4.75	8.76	8.81	+0.05	+0.57	10
-238	-14.48	-419	-0.58	43.67	50.76	+7.09	+16.24	11
-8	-1.96	-753	-8.34	22.09	20.65	-1.44	-6.52	12
-654	-25.74	-7,371	-21.11	13.74	14.60	+0.86	+6.26	13
+208	+11.99	-2,664	-2.77	56.04	48.66	-7.38	-13.17	14
+350	+25.74	+6,950	+19.41	26.32	25.00	-1.32	-5.02	15
+19,624	+7.51	+884	+6.71	0.05	0.05	=	=	16
+604	+22.97	+704	+11.63	2.30	2.09	-0.21	-9.13	17
+8,322	+87.78	+31,525	+82.35	4.04	3.92	-0.12	-2.97	18
+1	+0.39	+885	+10.41	33.35	36.68	+3.33	+9.99	19
-2,663	-10.53	+34,794	+2.35	58.62	67.07	+8.45	+14.41	20
+46	+6.70	+148	+10.80	1.99	2.07	+0.08	+4.02	21
+590	+13.83	-203	-2.72	1.75	1.49	-0.26	-14.86	22
-225	-20.02	-9,806	-19.69	44.31	44.49	+0.18	+0.41	23
-1,410	-47.99	-59,534	-47.53	42.63	43.01	+0.38	+0.89	24
+450	+7.76	+800	+8.08	1.71	1.71	=	=	25
+1,062½	+54.42	+44,686	+37.20	61.52	54.66	-6.86	-11.15	26
-400	-1.92	-3,800	-10.76	1.70	1.54	-0.16	-9.41	27
-1,962	-14.07	+440	+0.62	5.08	5.95	+0.87	+17.13	28
+28½	+9.23	+3,598	+15.35	92.12	97.28	+5.16	+5.60	29
+16,801	+49.67	+623,258	+49.18	39.84	39.71	-0.13	-0.33	30
+141	+73.06	+4,998	+55.64	46.54	41.86	-4.68	-10.06	31
+2,030½	+3.69	-36,867	-1.21	55.27	52.66	-2.61	-4.72	32
-120½	-3.28	-25,450	-5.07	125.40	123.07	-2.33	-1.86	33
-1,876	-19.59	-55,130	-23.00	25.03	23.96	-1.07	-4.27	34
+1,054	+1.34	-27,750	-4.15	8.51	8.05	-0.46	-5.41	35
+3,281	+16.35	+8,872	+17.15	2.58	2.60	+0.02	+0.76	36
-148	-7.79	-11,199	-9.44	62.46	61.35	-1.11	-1.78	37
+143	+47.53	+2,241	+57.04	4.22	4.49	+0.27	+6.40	38
+279	+6.73	+15,248	+7.71	47.68	48.11	+0.43	+0.90	39

1 No change in average price.



## STOCK USED: BY INDUSTRIES — Continued.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Rope, manila (old), . . .	100 pounds	89,044	\$236,421	106,767	\$264,858
2	Rosin, . . . . .	100 pounds	54,093	77,689	45,660	63,599
3	Rubber, crude . . . . .	100 pounds	74,283	3,382,672	71,384	4,208,757
4	Rubber, old . . . . .	100 pounds	41,000	165,000	40,350	164,400
5	Rye, . . . . .	bushels	46,455	35,016	42,399	37,592
6	Salt, . . . . .	tons	1,861½	10,426	1,371½	7,684
7	Sand (for glass), . . . .	tons	1,731	5,170	1,630	5,364
8	Sand, moulding . . . . .	tons	4,030	13,180	3,986	12,630
9	Satin, . . . . .	100 yards	481	22,285	318	16,793
10	Shellac, . . . . .	100 pounds	1,492	34,762	1,418	31,466
11	Shoddy, . . . . .	100 pounds	46,827	426,368	54,082	530,488
12	Silk, raw . . . . .	100 pounds	5,602	2,387,478	6,411	2,459,281
13	Silver, . . . . .	ounces	343,607	341,672	412,876	429,806
14	Silver, German . . . . .	100 pounds	1,179	34,780	1,812	56,710
	Skins:					
15	Calf, . . . . .	dozen	491	11,088	484	10,467
16	Calf (green), . . . . .	dozen	200,000	120,000	250,000	187,500
17	Calf (rough), . . . . .	dozen	143,000	113,802	180,000	142,243
18	Goat, . . . . .	dozen	166,277	1,195,831	159,313	1,089,598
19	Goat (India), . . . . .	dozen	55,991	402,007	61,405	414,588
20	Lamb, . . . . .	dozen	3,024	21,096	3,368	26,435
21	Seal, . . . . .	dozen	1,463	44,750	1,286	39,350
22	Sheep, . . . . .	dozen	441,189	1,294,818	349,797	1,235,579
23	Soda, caustic . . . . .	tons	2,597½	156,255	2,122½	126,330
24	Soda, nitrate of . . . . .	tons	845½	35,841	855½	34,548
25	Soda ash, . . . . .	tons	469½	13,562	531½	18,991
26	Solder, . . . . .	100 pounds	737	10,041	710	9,755
27	Soles, . . . . .	100 pairs	54,016	613,764	58,824	643,630
28	Spelter, . . . . .	100 pounds	39,774	218,748	32,265	172,204
29	Spiegeleisen, . . . . .	tons	273½	19,072	202	12,533
30	Starch, potato . . . . .	100 pounds	9,459	34,700	9,620	34,479
	Steel:					
31	Band, . . . . .	tons	844	45,080	806	41,533
32	Bar, . . . . .	tons	185	13,811	186½	14,415
33	Cast, . . . . .	tons	158½	23,498	129½	20,494
34	Gun, . . . . .	tons	352½	27,772	280½	20,172
35	Machinery, . . . . .	tons	12½	991	16	1,362
36	Open-hearth, . . . . .	tons	149	8,956	165½	10,942
37	Tool, . . . . .	100 pounds	341	4,708	352	4,870
38	Steel, n. s.,* . . . . .	tons	9,959	877,801	11,104½	956,151
39	Straw-board, . . . . .	tons	8,024½	382,623	7,678	300,084
40	Straw braid, . . . . .	100 pieces	10,715	238,246	10,407	224,846
41	Sugar, refined . . . . .	100 pounds	163,755	1,014,545	172,314	799,510
42	Sugar, refined . . . . .	barrels	9,197	196,371	8,768	153,100
43	Sumac, . . . . .	tons	995	57,931	674½	43,154

\* Not specified as to particular kind.

STOCK USED: BY INDUSTRIES — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Continued.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+17,723	+19.90	+828,437	+12.03	\$2.66	\$2.48	—\$0.13	—6.77	1
—8,433	—15.59	—14,090	—18.14	1.44	1.39	—0.05	—3.47	2
—2,899	—3.90	+826,085	+24.42	45.54	58.96	+13.42	+29.47	3
—650	—1.59	—600	—0.36	4.02	4.07	+0.05	+1.24	4
—8,056	—6.72	+2,576	+7.36	0.77	0.89	+0.12	+15.58	5
—490%	—26.33	—2,742	—26.30	5.60	5.60	<sup>1</sup> =	<sup>1</sup> =	6
—101	—5.83	+194	+3.75	2.99	3.29	+0.30	+10.03	7
—44	—1.09	—550	—4.17	3.27	3.17	—0.10	—3.06	8
—163	—33.89	—5,492	—24.64	46.33	52.81	+6.48	+13.99	9
—74	—4.96	—3,296	—9.48	23.30	22.19	—1.11	—4.76	10
+7,255	+13.49	+104,120	+24.42	9.11	9.81	+0.70	+7.68	11
+809	+14.44	+71,803	+3.01	426.18	383.60	—42.58	—9.99	12
+69,269	+20.16	+88,234	+25.83	0.99	1.04	+0.05	+5.05	13
+633	+53.69	+21,930	+63.05	29.50	31.30	+1.80	+6.10	14
—7	—1.43	—621	—5.60	22.58	21.63	—0.95	—4.21	15
+50,000	+25.00	+67,500	+56.25	0.60	0.75	+0.15	+25.00	16
+37,000	+25.87	+28,441	+24.99	0.80	0.79	—0.01	—1.25	17
—9,964	—5.89	—106,233	—8.88	7.06	6.84	—0.22	—3.12	18
+5,414	+9.67	+12,581	+3.13	7.18	6.75	—0.43	—5.99	19
+344	+11.38	+4,739	+21.84	7.17	7.85	+0.68	+9.48	20
—177	—12.10	—5,400	—12.07	30.59	30.60	+0.01	+0.03	21
—91,392	—20.71	—59,239	—4.58	2.93	3.53	+0.60	+20.48	22
—475%	—18.30	—29,925	—19.16	60.16	59.53	—0.63	—1.05	23
+0%	+1.15	—1,293	—3.61	42.38	40.38	—2.00	—4.72	24
+62%	+13.32	+5,429	+40.03	28.90	35.71	+6.81	+23.56	25
—27	—3.66	—286	—2.85	13.62	13.74	+0.12	+0.88	26
+4,808	+8.90	+29,866	+4.87	11.36	10.94	—0.42	—3.70	27
—7,509	—18.88	—46,539	—21.28	5.50	5.84	—0.16	—2.91	28
—71%	—26.14	—6,539	—34.29	69.73	62.04	—7.69	—11.03	29
+161	+1.70	—221	—0.64	3.67	3.58	—0.09	—2.45	30
—38	—4.50	—3,547	—7.87	53.41	51.53	—1.88	—3.52	31
+1%	+0.95	+604	+4.37	74.65	77.19	+2.54	+3.40	32
—29%	—18.48	—2,994	—12.75	147.96	158.25	+10.29	+6.95	33
—71%	—20.37	—7,000	—27.37	78.84	71.91	—6.93	—8.79	34
+3%	+28.00	+371	+37.44	79.28	85.13	+5.85	+7.38	35
+16%	+11.07	+1,986	+22.18	60.11	66.11	+6.00	+9.98	36
+11	+3.23	+162	+3.44	13.81	13.84	+0.03	+0.22	37
+1,145%	+11.50	+78,350	+8.93	88.14	86.11	—2.03	—2.30	38
—346%	—4.32	—32,539	—9.78	41.45	39.08	—2.37	—5.72	39
—308	—2.87	—13,403	—5.63	22.24	21.61	—0.63	—2.83	40
+8,559	+5.23	—215,035	—21.20	6.20	4.64	—1.56	—25.16	41
—429	—4.66	—43,271	—22.04	21.85	17.46	—3.89	—18.22	42
—320%	—32.20	—14,777	—25.51	58.22	63.97	+5.75	+9.88	43

<sup>1</sup> No change in average price.

## STOCK USED: BY INDUSTRIES — Concluded.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Concluded.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Tallow, . . . . .	100 pounds	131,644	\$488,852	117,282	\$440,432
2	Tallow, refined . . . . .	100 pounds	56,007	277,743	49,300	275,140
3	Tallow, rough . . . . .	100 pounds	54,253	252,155	81,699	229,508
4	Thread, rubber . . . . .	100 pounds	3,285	437,846	3,309	464,001
5	Tin,* . . . . .	100 pounds	6,111	180,366	8,299	168,494
6	Tin-plate, . . . . .	boxes	41,306	268,198	54,395	341,581
7	Tobacco,* . . . . .	100 pounds	3,949	212,783	3,806	211,033
8	Tobacco, domestic . . . . .	100 pounds	4,187	98,102	4,014	100,768
9	Tobacco, foreign . . . . .	100 pounds	5,270	632,907	4,958	602,083
10	Tubes, boiler . . . . .	100 feet	3,826	50,539	3,519	46,629
11	Twine, cotton . . . . .	100 pounds	2,985	64,470	4,498	92,206
12	Uppers, rubber . . . . .	pairs	19,620	83,465	12,972	28,668
13	Warp, cotton . . . . .	100 yards	95,180	210,003	110,344	249,800
14	Waste, cotton . . . . .	100 pounds	375,504	1,524,495	431,057	1,721,499
15	Waste, woollen . . . . .	100 pounds	11,522	96,095	9,577	96,655
	Wire :					
16	Brass, . . . . .	100 pounds	932	19,418	979	17,308
17	Copper, . . . . .	100 pounds	1,800	41,600	1,297	24,640
18	Iron, . . . . .	100 pounds	83,652	418,739	63,512	298,630
19	Steel, . . . . .	100 pounds	34,557	121,731	23,169	111,752
20	Wire, n. s.,* . . . . .	100 pounds	42,249	177,927	52,114	195,535
21	Wood (for burning brick), .	cords	47,690	184,273	48,568	186,936
22	Wool,* . . . . .	100 pounds	311,497	9,198,491	329,923	9,949,670
23	Wool, scoured . . . . .	100 pounds	80,058	3,705,998	63,381	3,423,982
24	Wool, unscoured . . . . .	100 pounds	186,983	4,208,376	266,975	5,854,119
	Yarn :					
25	Cotton, . . . . .	100 pounds	142,632	3,241,026	164,060	3,714,426
26	Jute, . . . . .	100 pounds	5,996	60,193	5,376	44,838
27	Linen, . . . . .	100 pounds	6,648	108,164	7,813	127,401
28	Mohair, . . . . .	pounds	32,268	66,536	42,105	74,313
29	Silk, . . . . .	pounds	6,332	44,753	8,696	50,034
30	Woollen, . . . . .	100 pounds	816	62,460	822	66,431
31	Worsted, . . . . .	100 pounds	35,174	2,909,528	38,893	3,260,636
32	Zinc, oxide of . . . . .	100 pounds	3,156	13,650	3,660	15,680
33	Zinc, sheet . . . . .	100 pounds	10,798	71,193	10,056	61,424

\* Not specified as to particular kind.

## STOCK USED: BY INDUSTRIES — Concluded.

COMPARISON OF QUANTITIES AND VALUES OF STOCK USED  
— 1890, 1891 — Concluded.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
-14,862	-10.91	-448,420	-0.90	\$3.71	\$3.76	+0.05	+0.13	1
-6,707	-11.98	-2,603	-0.94	4.96	5.58	+0.62	+12.50	2
-12,554	-13.32	-22,647	-8.98	2.68	2.81	+0.13	+4.85	3
+24	+0.73	+26,155	+5.97	183.29	140.22	+6.93	+5.20	4
+2,188	+35.80	+38,128	+29.25	21.33	20.30	-1.03	-4.83	5
+13,089	+31.69	+73,383	+27.36	6.49	6.28	-0.21	-3.24	6
-143	-3.62	-1,750	-0.82	53.88	55.45	+1.57	+2.91	7
-178	-4.18	+2,661	+2.71	23.43	25.10	+1.67	+7.18	8
-312	-5.92	-30,524	-4.83	120.04	121.44	+1.40	+1.17	9
-307	-8.02	-3,910	-7.74	13.21	13.25	+0.04	+0.30	10
+1,513	+50.69	+27,736	+43.02	21.60	20.50	-1.10	-5.09	11
-6,648	-33.88	-9,797	-25.47	1.96	2.21	+0.25	+12.76	12
+15,164	+15.93	+39,197	+18.61	2.21	2.26	+0.05	+2.26	13
+55,553	+14.79	+197,004	+12.92	4.06	3.99	-0.07	-1.72	14
-1,945	-16.88	+15.80	+1.64	8.25	10.09	+1.84	+22.30	15
+47	+5.04	-2,025	-10.43	20.83	17.77	-3.06	-14.69	16
-503	-27.94	-16,960	-40.77	23.11	19.00	-4.11	-17.78	17
-20,140	-24.08	-125,109	-29.88	5.01	4.62	-0.39	-7.78	18
-11,388	-32.95	-9,979	-8.20	3.52	4.82	+1.30	+36.93	19
+9,865	+23.35	+17,608	+9.90	4.21	3.75	-0.46	-10.93	20
+878	+1.84	+2,663	+1.45	3.86	3.85	-0.01	-0.26	21
+18,426	+5.92	+751,179	+8.17	29.53	30.16	+0.63	+2.13	22
-16,677	-20.83	-282,016	-7.61	46.29	54.02	+7.73	+16.70	23
+73,992	+39.57	+1,645,743	+39.11	22.51	22.43	-0.08	-0.86	24
+21,428	+15.02	+473,400	+14.61	22.72	22.64	-0.08	-0.35	25
-620	-10.34	-15,355	-25.51	10.04	8.34	-1.70	-16.93	26
+1,165	+17.52	+19,237	+17.79	16.27	16.31	+0.04	+0.25	27
+9,837	+30.49	+7,777	+11.69	2.06	1.76	-0.30	-14.56	28
+2,364	+37.33	+5,281	+11.80	7.07	5.75	-1.32	-18.67	29
+6	+0.74	+2,971	+4.76	76.54	79.60	+3.06	+4.00	30
+3,719	+10.57	+341,108	+11.72	82.72	83.58	+0.86	+1.04	31
+504	+15.97	+2,030	+14.87	4.33	4.28	-0.05	-1.15	32
-742	-6.87	-9,769	-13.72	6.59	6.11	-0.48	-7.28	33



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**GOODS MADE:**  
**BY INDUSTRIES AND TOWNS.**

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# GOODS MADE: BY INDUSTRIES.

1890, 1891.

[In this presentation, the figures given under "Value of Goods Made and Work Done" represent the returns made by the same establishments, in each industry, for the years 1890 and 1891, the whole number of establishments considered in "All Industries" being 3,745. Comparison is made, as regards the value of goods made and work done, between these two years. The relative increase or decrease in 1891 as compared with 1890 is given with its equivalent percentage.]

INDUSTRIES.	Number of Establishments Considered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percentages
Agricultural implements, . . .	11	\$1,398,773	\$1,196,237	-\$202,536	-14.48
Arms and ammunition, . . .	12	2,097,316	2,463,477	+366,161	+17.46
Artisans' tools, . . .	56	2,508,709	2,670,371	+161,662	+6.44
Awnings, sails, tents, etc., . . .	30	453,622	443,830	-9,792	-2.16
Boots and shoes, . . .	567	90,550,454	89,229,603	-1,320,851	-1.46
Boxes (paper and wooden), . . .	141	4,514,207	4,564,781	+50,574	+1.12
Brick, tiles, and sewer pipe, . . .	45	1,183,861	1,309,591	+125,730	+10.62
Brooms, brushes, and mops, . . .	21	1,262,499	1,299,836	+37,337	+2.96
Burial cases, caskets, coffins, etc., . . .	6	360,099	373,496	+13,397	+3.72
Buttons and dress trimmings, . . .	17	1,269,823	1,421,289	+151,466	+11.93
Carpetings, . . .	12	7,731,055	8,967,614	+1,236,559	+15.99
Carriages and wagons, . . .	96	3,959,570	4,105,774	+146,204	+3.69
Cement, kaolin, lime, and plaster, . . .	4	107,300	92,270	-15,030	-14.01
Chemical preparations (compounded), . . .	9	904,288	902,359	-1,929	-0.21
Clocks, watches, and jewelry, . . .	77	5,928,663	5,912,585	-16,078	-0.27
Clothing, . . .	113	25,841,136	26,405,093	+563,957	+2.18
Cooking, lighting, and heating apparatus, . . .	31	3,202,599	3,391,687	+189,088	+5.90
Cordage and twine, . . .	25	9,494,761	9,447,666	-47,095	-0.50
Corks, bungs, and taps, . . .	4	73,397	64,150	-9,247	-12.60
Cotton goods, . . .	157	90,063,208	89,857,630	-205,573	-0.23
Cotton, woollen, and other textiles, . . .	3	3,315,260	3,673,724	+358,524	+10.81
Crayons, pencils, crucibles, etc., . . .	4	144,009	179,685	+35,676	+24.77
Drugs and medicines, . . .	19	3,068,465	3,388,600	+320,135	+10.43
Dyestuffs, . . .	7	1,244,101	1,188,256	-55,845	-4.49
Earthen, plaster, and stone ware, . . .	4	252,341	266,572	+14,231	+5.64
Electrical apparatus and appliances, . . .	5	12,703,325	10,431,670	-2,271,655	-17.88
Electroplating, . . .	10	96,146	105,797	+9,651	+10.04
Emery and sand paper and cloth, etc., . . .	13	861,558	935,867	+74,309	+8.62
Fancy articles, . . .	6	233,659	245,092	+11,433	+4.89
Fertilizers, . . .	7	406,471	344,962	-61,509	-15.13
Fine arts and taxidermy, . . .	2	8,700	9,000	+300	+3.45
Fireworks and matches, . . .	3	64,750	99,113	+34,363	+53.07
Flax, hemp, jute, and linen goods, . . .	8	3,086,842	3,074,929	-11,913	-0.39
Food preparations, . . .	264	61,376,177	65,000,721	+3,624,544	+5.91
Furniture, . . .	120	9,362,892	9,939,536	+577,144	+6.16



## GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.

## GOODS MADE: BY INDUSTRIES—1890, 1891—Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Glass, . . . . .	10	\$511,200	\$556,356	+\$55,096	+10.78
Glue, isinglass, and starch, . . .	14	1,157,978	1,037,519	-120,459	-10.40
Hair work (animal and human), . .	10	526,130	533,730	+7,600	+1.44
Hose: rubber, linen, etc., . . . .	5	609,094	782,179	+113,085	+18.90
Hosiery and knit goods, . . . . .	40	4,589,955	5,539,409	+949,514	+20.69
Ink, muclage, and paste, . . . . .	8	397,226	431,411	+34,185	+8.61
Ivory, bone, shell, and horn goods, etc.,	13	523,611	611,401	+82,790	+15.66
Leather, . . . . .	154	20,122,480	17,090,803	-\$3,031,677	-15.07
Liquors and beverages (not spirit- uous), . . . . .	12	359,015	366,283	+7,268	+2.02
Liquors: malt, distilled, and fer- mented, . . . . .	49	6,389,913	6,972,169	+582,256	+9.11
Lumber, . . . . .	25	2,304,232	2,431,462	+127,230	+5.52
Machines and machinery, . . . . .	203	25,212,841	24,876,466	-336,375	-1.33
Metals and metallic goods, . . . .	277	34,124,906	34,198,526	+73,620	+0.22
Mixed textiles, . . . . .	13	1,939,739	1,828,082	-111,657	-5.76
Models and patterns, . . . . .	5	93,749	108,464	+14,715	+15.70
Musical instruments and materials, .	46	5,590,946	5,336,790	-254,156	-4.55
Oils and illuminating fluids, . . .	9	1,181,543	1,308,633	+127,090	+10.76
Paints, colors, and crude chemicals,	16	1,129,946	1,041,373	-88,573	-7.84
Paper and paper goods, . . . . .	102	25,219,222	25,803,660	+584,438	+2.32
Perfumes, toilet articles, etc., . . .	4	257,225	312,825	+55,600	+21.62
Photographs and photographic ma- terials, . . . . .	11	305,041	299,109	-5,932	-1.94
Pollishes and dressing, . . . . .	18	1,310,420	1,415,582	+105,162	+8.03
Printing, publishing, and bookbind- ing, . . . . .	24	3,642,047	3,613,297	-28,750	-0.79
Print works, dye works, and bleach- eries, . . . . .	37	18,406,986	17,079,276	-1,327,710	-7.21
Railroad construction and equipment,	14	3,905,124	3,959,211	+54,087	+1.39
Rubber and elastic goods, . . . . .	30	22,798,934	23,655,976	+857,042	+3.76
Scientific instruments and appliances,	11	1,190,672	1,284,038	+93,366	+7.84
Shipbuilding, . . . . .	42	1,193,542	1,275,416	+81,874	+6.86
Silk and silk goods, . . . . .	9	4,461,791	4,510,716	+48,925	+1.10
Sporting and athletic goods, . . . .	9	400,200	450,043	+49,843	+12.45
Stone, . . . . .	111	3,696,107	3,757,601	+61,494	+1.66
Straw and palm leaf goods, . . . .	17	3,340,090	3,670,905	+330,815	+9.90
Tallow, candles, soap, and grease, .	55	3,401,099	3,270,852	-130,247	-3.83
Tobacco, snuff, and cigars, . . . .	85	2,423,044	2,517,056	+94,012	+3.88
Toys and games (children's), . . . .	8	516,306	560,934	+44,628	+8.64
Trunks and valises, . . . . .	7	266,062	269,465	+3,403	+1.66
Whips, lashes, and stocks, . . . . .	15	991,300	1,045,613	+54,313	+5.48
Wooden goods, . . . . .	149	4,848,082	5,076,486	+228,404	+4.71
Woollen goods, . . . . .	188	31,151,139	33,989,359	+2,838,220	+9.11
Worsted goods, . . . . .	21	15,350,196	17,219,318	+1,869,122	+12.18
ALL INDUSTRIES, . . . . .	3,745	\$605,032,664	\$613,100,717	+\$8,068,053	+1.33

## COMPARISON OF GOODS MADE. SAME ESTABLISHMENTS. FOR THE FIVE YEARS

1887—1891.

[In this presentation, the figures given under "Value of Goods Made and Work Done" represent the returns made by the same establishments, in each industry considered, for each of the five years 1887, 1888, 1889, 1890, and 1891, the whole number of establishments represented being 1,130. The table allows of comparison being made, as regards the value of goods made and work done, between any two years of the five years for which figures are given. The relative increase or decrease in 1888 as compared with 1887, in 1889 as compared with 1888, in 1890 as compared with 1889, and in 1891 as compared with 1890, is given, with its equivalent percentage.]

INDUSTRIES, AND YEARS.	Number of Estab- lishments Con- sidered	Value of Goods Made and Work Done	INCREASE (+), OR DE- CREASE (-), AS COMPARED WITH PREVIOUS YEAR	
			Amounts	Percent- ages
<i>Agricultural Implements.</i>				
1887, . . . . .	5	\$1,211,350	-	-
1888, . . . . .	5	1,276,435	+\$65,085	+5.37
1889, . . . . .	5	1,305,138	+28,703	+2.25
1890, . . . . .	5	1,367,841	+62,203	+4.77
1891, . . . . .	5	1,168,853	-208,488	-14.88
<i>Arms and Ammunition.</i>				
1887, . . . . .	8	\$1,431,979	-	-
1888, . . . . .	8	1,283,268	-\$148,711	-10.38
1889, . . . . .	8	1,183,261	-100,007	-7.79
1890, . . . . .	8	1,319,226	+135,965	+11.49
1891, . . . . .	8	1,598,648	+279,422	+21.18
<i>Artisans' Tools.</i>				
1887, . . . . .	10	\$1,684,413	-	-
1888, . . . . .	10	1,778,148	+\$93,730	+5.56
1889, . . . . .	10	1,670,800	-107,343	-6.04
1890, . . . . .	10	1,917,000	+246,200	+14.74
1891, . . . . .	10	2,066,562	+149,562	+7.80
<i>Boots and Shoes.</i>				
1887, . . . . .	210	\$45,128,107	-	-
1888, . . . . .	210	45,946,330	+\$818,223	+1.81
1889, . . . . .	210	49,533,711	+3,587,381	+7.81
1890, . . . . .	210	51,423,997	+1,890,286	+3.82
1891, . . . . .	210	49,175,938	-2,248,059	-4.37
<i>Boxes (Paper and Wooden).</i>				
1887, . . . . .	21	\$1,420,201	-	-
1888, . . . . .	21	1,421,668	+\$1,467	+0.10
1889, . . . . .	21	1,489,304	+67,636	+4.76
1890, . . . . .	21	1,504,500	+15,196	+1.02
1891, . . . . .	21	1,514,221	+9,721	+0.65

GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.  
COMPARISON OF GOODS MADE. SAME ESTABLISHMENTS.  
FOR THE FIVE YEARS 1887—1891—Continued.

INDUSTRIES, AND YEARS.	Number of Establishments Considered	Value of Goods Made and Work Done	INCREASE (+), OR DECREASE (—), AS COMPARED WITH PREVIOUS YEAR	
			Amounts	Percentages
<i>Buttons and Dress Trimmings.</i>				
1887, . . . . .	7	\$608,896	-	-
1888, . . . . .	7	611,464	+ \$2,568	+0.42
1889, . . . . .	7	460,215	-151,249	-24.74
1890, . . . . .	7	482,494	+22,279	+4.84
1891, . . . . .	7	475,763	-6,731	-1.40
<i>Carpetings.</i>				
1887, . . . . .	6	\$6,159,028	-	-
1888, . . . . .	6	6,063,914	- \$95,114	-1.54
1889, . . . . .	6	6,682,080	+568,166	+9.37
1890, . . . . .	6	7,239,596	+607,516	+9.16
1891, . . . . .	6	8,434,264	+1,194,668	+16.50
<i>Carriages and Wagons.</i>				
1887, . . . . .	19	\$1,469,699	-	-
1888, . . . . .	19	1,642,892	+ \$173,193	+11.78
1889, . . . . .	19	1,526,298	-116,594	-7.10
1890, . . . . .	19	1,632,696	+106,398	+6.97
1891, . . . . .	19	1,685,774	+53,078	+3.25
<i>Clocks, Watches, and Jewelry.</i>				
1887, . . . . .	41	\$4,002,692	-	-
1888, . . . . .	41	4,047,652	+ \$44,960	+1.12
1889, . . . . .	41	4,144,702	+97,050	+2.40
1890, . . . . .	41	4,393,173	+248,471	+5.99
1891, . . . . .	41	4,448,623	+55,450	+1.26
<i>Clothing.</i>				
1887, . . . . .	40	\$13,297,866	-	-
1888, . . . . .	40	13,828,607	+ \$530,741	+3.99
1889, . . . . .	40	13,211,042	-617,565	-4.47
1890, . . . . .	40	13,935,038	+723,996	+5.48
1891, . . . . .	40	14,324,743	+389,705	+2.80
<i>Cordage and Twine.</i>				
1887, . . . . .	11	\$5,294,191	-	-
1888, . . . . .	11	6,731,439	+ \$1,437,248	+27.15
1889, . . . . .	11	8,264,743	+1,533,304	+22.78
1890, . . . . .	11	7,600,061	-664,682	-8.04
1891, . . . . .	11	8,001,699	+401,638	+5.28
<i>Cotton Goods.</i>				
1887, . . . . .	127	\$72,386,813	-	-
1888, . . . . .	127	77,333,700	+ \$4,946,887	+6.83
1889, . . . . .	127	80,466,689	+3,132,989	+4.05
1890, . . . . .	127	82,780,571	+2,313,882	+2.88
1891, . . . . .	127	81,545,330	-1,235,241	-1.49

GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.  
COMPARISON OF GOODS MADE. SAME ESTABLISHMENTS.  
FOR THE FIVE YEARS 1887—1891—Continued.

INDUSTRIES, AND YEARS.	Number of Estab- lishments Con- sidered	Value of Goods Made and Work Done	INCREASE (+), OR DE- CREASE (-), AS COMPARED WITH PREVIOUS YEAR	
			Amounts	Percent- ages
<i>Flax, Hemp, Jute, and Linen Goods.</i>				
1887, . . . . .	6	\$2,508,924	-	-
1888, . . . . .	6	2,734,490	+ \$225,566	+8.99
1889, . . . . .	6	2,584,923	-149,567	-5.47
1890, . . . . .	6	3,022,342	+437,419	+16.92
1891, . . . . .	6	2,967,929	-54,413	-1.80
<i>Food Preparations.</i>				
1887, . . . . .	49	\$16,460,023	-	-
1888, . . . . .	49	18,675,798	+ \$2,215,775	+13.46
1889, . . . . .	49	17,900,226	-775,572	-4.15
1890, . . . . .	49	19,832,974	+1,932,748	+10.80
1891, . . . . .	49	22,982,640	+3,149,666	+15.88
<i>Furniture.</i>				
1887, . . . . .	39	\$4,557,617	-	-
1888, . . . . .	39	4,524,865	- \$32,752	-0.72
1889, . . . . .	39	4,518,157	-6,708	-0.15
1890, . . . . .	39	4,714,517	+196,360	+4.35
1891, . . . . .	39	4,996,268	+281,751	+5.98
<i>Glass.</i>				
1887, . . . . .	5	\$388,656	-	-
1888, . . . . .	5	418,331	+ \$29,675	+7.64
1889, . . . . .	5	421,969	+3,638	+0.87
1890, . . . . .	5	423,988	+2,019	+0.48
1891, . . . . .	5	470,611	+46,623	+11.00
<i>Hosiery and Knit Goods.</i>				
1887, . . . . .	11	\$4,484,001	-	-
1888, . . . . .	11	3,973,174	- \$510,827	-11.39
1889, . . . . .	11	3,534,860	-438,314	-11.03
1890, . . . . .	11	3,556,782	+21,922	+0.62
1891, . . . . .	11	4,286,728	+729,946	+20.52
<i>Leather.</i>				
1887, . . . . .	70	\$11,257,725	-	-
1888, . . . . .	70	10,419,910	- \$837,815	-7.44
1889, . . . . .	70	10,041,146	-378,764	-3.64
1890, . . . . .	70	10,990,959	+949,813	+9.46
1891, . . . . .	70	9,435,223	-1,555,736	-14.15
<i>Liquors: Malt, Distilled, and Fermented.</i>				
1887, . . . . .	18	\$3,420,084	-	-
1888, . . . . .	18	4,047,416	+ \$627,332	+18.34
1889, . . . . .	18	3,704,845	-342,571	-8.46
1890, . . . . .	18	3,873,219	+168,374	+4.54
1891, . . . . .	18	4,189,201	+315,982	+8.16

GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.  
COMPARISON OF GOODS MADE. SAME ESTABLISHMENTS.  
FOR THE FIVE YEARS 1887—1891—Continued.

INDUSTRIES, AND YEARS.	Number of Estab- lishments Con- sidered	Value of Goods Made and Work Done	INCREASE (+), OR DE- CREASE (-), AS COMPARED WITH PREVIOUS YEAR	
			Amounts	Percent- ages
<i>Machines and Machinery.</i>				
1887, . . . . .	67	\$11,463,583	-	-
1888, . . . . .	67	12,113,778	+\$650,245	+5.67
1889, . . . . .	67	13,784,810	+1,671,032	+13.79
1890, . . . . .	67	13,995,143	+210,333	+1.53
1891, . . . . .	67	13,858,781	-136,362	-0.97
<i>Metals and Metallic Goods.</i>				
1887, . . . . .	74	\$12,885,933	-	-
1888, . . . . .	74	12,791,445	-\$94,488	-0.73
1889, . . . . .	74	13,525,577	+784,132	+5.74
1890, . . . . .	74	13,758,006	+232,429	+1.72
1891, . . . . .	74	14,531,448	+773,442	+5.62
<i>Mixed Textiles.</i>				
1887, . . . . .	9	\$1,407,165	-	-
1888, . . . . .	9	1,426,956	+\$19,791	+1.41
1889, . . . . .	9	1,458,934	+31,973	+2.24
1890, . . . . .	9	1,440,306	-18,623	-1.28
1891, . . . . .	9	1,348,833	-91,473	-6.35
<i>Musical Instruments and Materials.</i>				
1887, . . . . .	21	\$3,894,517	-	-
1888, . . . . .	21	3,968,723	+\$74,206	+1.91
1889, . . . . .	21	4,337,425	+368,702	+9.29
1890, . . . . .	21	4,716,160	+378,735	+8.73
1891, . . . . .	21	4,392,342	-323,818	-6.87
<i>Paper and Paper Goods.</i>				
1887, . . . . .	56	\$14,036,105	-	-
1888, . . . . .	56	15,208,936	+\$1,172,831	+8.36
1889, . . . . .	56	15,783,058	+574,122	+3.77
1890, . . . . .	56	15,830,730	+47,672	+0.30
1891, . . . . .	56	16,245,397	+414,667	+2.62
<i>Print Works, Dye Works, and Bleacheries.</i>				
1887, . . . . .	16	\$17,319,085	-	-
1888, . . . . .	16	16,305,952	-\$1,013,133	-5.85
1889, . . . . .	16	17,067,206	+761,254	+4.67
1890, . . . . .	16	17,886,234	+819,028	+4.80
1891, . . . . .	16	16,574,544	-1,311,690	-7.33
<i>Rubber and Elastic Goods.</i>				
1887, . . . . .	19	\$10,880,500	-	-
1888, . . . . .	19	10,932,602	+\$52,102	+0.48
1889, . . . . .	19	11,261,848	+329,246	+3.01
1890, . . . . .	19	12,063,537	+801,689	+7.12
1891, . . . . .	19	11,741,040	-322,497	-2.67

**GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.**  
**COMPARISON OF GOODS MADE. SAME ESTABLISHMENTS.**  
**FOR THE FIVE YEARS 1887—1891—Continued.**

INDUSTRIES, AND YEARS.	Number of Estab- lishments Con- sidered	Value of Goods Made and Work Done	INCREASE (+), OR DE- CREASE (-), AS COMPARED WITH PREVIOUS YEAR	
			Amounts	Percent- ages
<i>Shipbuilding.</i>				
1887, . . . . .	3	\$336,214	-	-
1888, . . . . .	3	349,032	+\$12,818	+3.81
1889, . . . . .	3	400,300	+51,268	+14.09
1890, . . . . .	3	522,400	+122,100	+30.50
1891, . . . . .	3	506,241	-16,159	-3.09
<i>Silk and Silk Goods.</i>				
1887, . . . . .	6	\$3,773,496	-	-
1888, . . . . .	6	3,737,363	-\$36,133	-0.96
1889, . . . . .	6	4,185,171	+447,808	+11.98
1890, . . . . .	6	4,118,191	-66,980	-1.60
1891, . . . . .	6	4,238,216	+120,025	+2.91
<i>Stones.</i>				
1887, . . . . .	17	\$1,651,875	-	-
1888, . . . . .	17	1,481,086	-\$170,789	-10.34
1889, . . . . .	17	1,406,762	-74,324	-5.02
1890, . . . . .	17	1,813,269	-93,493	-6.65
1891, . . . . .	17	1,354,287	+41,018	+3.12
<i>Straw and Palm Leaf Goods.</i>				
1887, . . . . .	15	\$3,004,614	-	-
1888, . . . . .	15	2,989,913	-\$14,701	-0.49
1889, . . . . .	15	2,692,192	-297,721	-9.96
1890, . . . . .	15	2,786,670	+94,478	+3.51
1891, . . . . .	15	3,018,057	+231,387	+8.30
<i>Tallow, Candles, Soap, and Grease.</i>				
1887, . . . . .	13	\$2,089,191	-	-
1888, . . . . .	13	2,303,111	+\$213,920	+10.24
1889, . . . . .	13	2,538,188	+235,077	+10.21
1890, . . . . .	13	2,561,905	+53,717	+2.12
1891, . . . . .	13	2,431,716	-160,189	-6.18
<i>Wooden Goods.</i>				
1887, . . . . .	15	\$1,364,952	-	-
1888, . . . . .	15	1,272,158	-\$92,794	-6.80
1889, . . . . .	15	1,209,299	-62,859	-4.94
1890, . . . . .	15	1,330,931	+121,632	+10.06
1891, . . . . .	15	1,407,917	+76,986	+5.78
<i>Woollen Goods.</i>				
1887, . . . . .	81	\$24,081,388	-	-
1888, . . . . .	81	23,385,892	-\$695,496	-2.89
1889, . . . . .	81	23,956,160	+570,268	+2.44
1890, . . . . .	81	23,621,576	-334,584	-1.40
1891, . . . . .	81	25,845,323	+2,223,747	+9.41

GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.  
 COMPARISON OF GOODS MADE. SAME ESTABLISHMENTS.  
 FOR THE FIVE YEARS 1887—1891—Concluded.

INDUSTRIES, AND YEARS.	Number of Estab- lishments Con- sidered	Value of Goods Made and Work Done	INCREASE (+), OR DE- CREASE (—), AS COMPARED WITH PREVIOUS YEAR	
			Amounts	Percent- ages
<i>Worsted Goods.</i>				
1887, . . . . .	15	\$6,426,494	—	—
1888, . . . . .	15	6,638,141	+ \$211,647	+3.29
1889, . . . . .	15	7,237,613	+599,472	+9.03
1890, . . . . .	15	7,409,595	+171,982	+2.38
1891, . . . . .	15	7,943,365	+533,770	+7.20
<b>TOTALS.</b>				
1887, . . . . .	1,130	\$311,787,327	—	—
1888, . . . . .	1,130	321,664,584	+ \$9,877,257	+3.17
1889, . . . . .	1,130	333,438,652	+11,774,068	+3.66
1890, . . . . .	1,130	345,395,127	+11,956,475	+3.59
1891, . . . . .	1,130	349,201,525	+3,806,398	+1.10

# COMPARISON OF GOODS MADE. SAME ESTABLISHMENTS. FOR THE YEARS 1885, 1890.

[In this presentation, the figures given under "Value of Goods Made and Work Done" represent the returns made by the same establishments, in each industry, for 1890 and the Census year 1885, the whole number of establishments considered in "All Industries" being 3,817. Comparison is made, as regards the value of goods made and work done, between these two years. The relative increase or decrease in 1890 as compared with 1885 is given with its equivalent percentage.]

INDUSTRIES.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
Agricultural implements, . . .	11	\$1,041,427	\$1,398,773	+357,346	+34.81
Arms and ammunition, . . .	13	1,885,732	2,096,890	+211,158	+11.20
Artisans' tools, . . . . .	56	1,937,855	2,522,021	+584,166	+30.14
Awning, sails, tents, etc., . . .	34	499,945	535,185	+35,240	+7.05
Boots and shoes, . . . . .	523	75,420,266	89,245,667	+13,825,401	+18.33
Boxes (paper and wooden), . . .	130	3,582,792	4,483,215	+900,423	+25.13
Brick, tiles, and sewer pipe, . . .	50	1,323,991	1,691,772	+367,781	+27.30
Brooms, brushes, and mops, . . .	20	474,466	463,037	-11,429	-2.41
Burial cases, caskets, coffins, etc., .	5	332,245	310,089	-22,156	-6.67
Buttons and dress trimmings, . . .	15	1,403,795	1,160,550	-243,245	-17.33
Carpetings, . . . . .	11	5,991,919	7,494,940	+1,503,021	+25.08
Carriages and wagons, . . . . .	123	4,540,698	5,783,919	+1,243,221	+27.38
Cement, kaolin, lime, and plaster, .	4	73,305	152,100	+78,795	+107.49
Chemical preparations (com- pounded), . . . . .	12	1,095,744	1,052,256	-43,488	-3.97
Clocks, watches, and jewelry, . . .	86	7,043,451	9,173,087	+2,129,636	+30.24
Clothing, . . . . .	126	20,384,526	25,947,437	+5,562,911	+27.29
Cooking, lighting, and heating apparatus, . . . . .	41	3,150,697	3,463,159	+312,462	+9.92
Cordage and twine, . . . . .	24	4,868,874	9,186,434	+4,317,560	+88.68
Corks, bungs, and taps, . . . . .	2	93,000	40,857	-52,143	-56.07
Cotton goods, . . . . .	142	62,107,118	86,757,933	+23,650,815	+38.08
Cotton, woollen, and other textiles, .	2	3,384,981	3,244,480	-140,501	-4.15
Crayons, pencils, crucibles, etc., .	3	84,910	102,200	+17,290	+20.36
Drugs and medicines, . . . . .	20	2,815,328	3,174,215	+358,887	+12.75
Dyestuffs, . . . . .	6	599,881	629,101	+29,220	+4.87
Earthen, plaster, and stone ware, . .	5	195,600	322,341	+126,741	+64.80
Electrical apparatus and appli- ances, . . . . .	4	539,016	12,693,325	+12,154,309	+2,254.91
Electroplating, . . . . .	10	129,757	111,462	-18,295	-14.10
Emery and sand paper and cloth, etc., . . . . .	10	458,899	616,558	+157,659	+34.36
Fancy articles, . . . . .	5	63,812	111,029	+47,217	+73.99
Fertilizers, . . . . .	6	141,700	127,946	-13,754	-9.71
Fine arts and taxidermy, . . . . .	3	12,500	13,700	+1,200	+9.60
Fireworks and matches, . . . . .	2	38,364	81,000	+42,636	+110.62
Flax, hemp, jute, and linen goods, .	8	2,255,090	3,086,842	+831,752	+36.88
Food preparations, . . . . .	332	55,020,306	66,552,478	+11,532,172	+20.96
Furniture, . . . . .	150	7,706,086	8,705,998	+999,912	+12.98
Glass, . . . . .	12	579,619	628,133	+48,514	+8.37
Glue, isinglass, and starch, . . . .	14	915,564	1,078,703	+163,139	+17.82



## GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.

COMPARISON OF GOODS MADE. SAME ESTABLISHMENTS.  
FOR THE YEARS 1885, 1890—Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
Hair work (animal and human),	11	\$385,830	\$534,349	+\$149,019	+38.67
Hose: rubber, linen, etc., . .	3	790,480	578,547	-211,933	-26.81
Hosiery and knit goods, . .	23	8,172,550	3,906,296	+733,746	+23.13
Ink, mucilage, and paste, . .	7	141,212	119,976	-21,236	-15.04
Ivory, bone, shell, and horn goods, etc., . . . . .	17	754,697	1,296,476	+541,779	+71.79
Leather, . . . . .	169	20,708,151	21,787,286	+1,079,135	+5.21
Liquors and beverages (not spir- ituous), . . . . .	12	233,639	359,015	+125,376	+53.66
Liquors: malt, distilled, and fer- mented, . . . . .	57	6,452,924	7,151,509	+698,585	+10.83
Lumber, . . . . .	24	1,528,897	1,932,932	+404,035	+26.43
Machines and machinery, . .	255	14,727,678	24,715,319	+9,987,641	+67.82
Metals and metallic goods, . .	268	23,287,738	33,009,798	+9,722,060	+41.75
Mixed textiles, . . . . .	11	1,196,333	1,883,017	+686,684	+57.40
Models and patterns, . . . .	5	78,505	93,749	+15,244	+19.42
Musical instruments and materials,	45	4,834,461	6,784,910	+1,950,449	+40.34
Oils and illuminating fluids, .	9	1,468,356	1,181,660	-287,196	-19.55
Paints, colors, and crude chemicals,	12	767,027	823,661	+56,634	+7.38
Paper and paper goods, . . .	95	18,795,947	23,028,995	+4,233,048	+22.52
Perfumes, toilet articles, etc., .	5	193,000	255,225	+62,225	+32.24
Photographs and photographic materials, . . . . .	11	254,802	343,701	+88,899	+34.89
Polishes and dressing, . . . .	20	1,263,515	1,346,103	+82,588	+6.54
Printing, publishing, and book- binding, . . . . .	18	2,170,822	2,518,782	+348,460	+16.06
Print works, dye works, and bleacheries, . . . . .	39	11,786,319	19,063,617	+7,277,298	+61.74
Railroad construction and equip- ment, . . . . .	7	1,769,750	2,931,949	+1,162,199	+65.67
Rubber and elastic goods, . .	26	11,734,756	22,725,018	+10,990,262	+93.66
Scientific instruments and appli- ances, . . . . .	13	1,054,125	1,398,037	+343,912	+32.63
Shipbuilding, . . . . .	47	1,143,865	1,656,916	+513,051	+44.85
Silk and silk goods, . . . .	8	3,198,740	4,631,971	+1,433,231	+44.81
Sporting and athletic goods, .	9	760,890	415,200	-345,690	-45.43
Stone, . . . . .	120	4,230,529	3,813,802	-416,727	-9.85
Straw and palm leaf goods, . .	18	4,512,519	4,474,375	-38,144	-0.85
Tallow, candles, soap, and grease,	62	3,311,061	3,487,735	+176,674	+5.34
Tobacco, snuff, and cigars, . .	38	1,486,964	2,383,078	+896,114	+60.26
Toys and games (children's), .	9	307,289	526,390	+219,121	+71.31
Trunks and valises, . . . .	9	243,025	276,062	+33,037	+13.59
Whips, lashes, and stocks, . .	11	745,700	851,150	+105,450	+14.14
Wooden goods, . . . . .	157	4,483,003	5,171,065	+688,062	+15.35
Woollen goods, . . . . .	126	26,859,083	30,915,808	+4,056,725	+15.10
Worsted goods, . . . . .	16	7,802,735	11,469,957	+3,667,222	+47.00
ALL INDUSTRIES, . . . .	3,317	\$460,834,656	\$603,032,268	+\$142,197,612	+30.86

# COMPARISON OF GOODS MADE. SELECTED INDUSTRIES: BY COUNTIES, CITIES, AND TOWNS.

1885, 1890.

[In this presentation, the value of goods made and work done is shown for certain establishments by cities and towns under selected industries, each industry section being followed by a recapitulation covering the counties of the State. The number of establishments given does not, in any instance, represent the *total* number of establishments in any city, town, or industry; it includes those only which reported the value of goods made and work done in the Census year 1885 and also in 1890, thus admitting of direct comparison between the two years. The relative increase or decrease in 1890 as compared with 1885 is given with its equivalent percentage. In order not to disclose the business of individual manufacturers certain establishments are omitted from the town showing, being included, however, in the line "Other cities and towns" and in the State recapitulation.]

## BOOTS AND SHOES.

THE STATE, COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
BERKSHIRE.					
North Adams, . . . .	5	\$1,178,492	\$2,009,696	+\$831,204	+70.53
ESSEX.					
Beverly, . . . . .	18	3,721,805	3,084,732	-637,073	-17.12
Danvers, . . . . .	9	687,065	690,283	+3,218	+0.47
Georgetown, . . . . .	6	306,000	370,838	+64,838	+21.19
HAVERHILL, . . . . .	96	6,635,456	9,275,055	+2,639,599	+39.78
LYNN, . . . . .	89	12,017,059	13,162,576	+1,145,517	+9.53
Marblehead, . . . . .	14	600,950	693,585	+92,635	+15.41
Peabody, . . . . .	4	110,193	56,921	-53,272	-48.34
Rowley, . . . . .	5	225,905	195,762	-30,143	-13.34
SALEM, . . . . .	19	1,700,906	1,181,015	-519,891	-30.57
MIDDLESEX.					
Holliston, . . . . .	4	159,750	130,598	-29,152	-18.25
Hudson, . . . . .	6	1,839,232	1,760,639	-78,593	-4.27
MARLBOROUGH, . . . . .	9	4,845,224	4,851,483	+6,259	+0.13
Natick, . . . . .	13	1,957,126	1,472,566	-484,570	-24.76
Stoneham, . . . . .	13	1,383,114	1,783,130	+450,016	+33.76
Wakefield, . . . . .	5	206,767	351,456	+144,689	+69.98
WOBURN, . . . . .	6	348,222	212,332	-135,890	-39.02
NORFOLK.					
QUINCY, . . . . .	4	573,606	838,239	+264,633	+46.13
Randolph, . . . . .	5	92,730	214,217	+121,487	+131.01
Stoughton, . . . . .	6	617,106	753,503	+136,397	+22.10
Weymouth, . . . . .	17	2,400,380	3,632,285	+1,231,905	+51.32

## GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.

## COMPARISON OF GOODS MADE. SELECTED INDUSTRIES: BY COUNTIES, CITIES, AND TOWNS. 1885, 1890 — Continued.

## BOOTS AND SHOES — Concluded.

THE STATE, COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
PLYMOUTH.					
Abington, . . . . .	7	\$1,398,000	\$1,834,946	+\$436,946	+31.26
Brockton, . . . . .	39	7,833,473	12,256,962	+4,423,489	+56.47
Middleborough, . . . . .	4	557,630	1,193,300	+635,670	+113.99
Rockland, . . . . .	7	1,124,230	1,843,978	+719,748	+19.55
SUFFOLK.					
Boston, . . . . .	15	1,853,826	1,690,073	-163,753	-8.83
WORCESTER.					
Milford, . . . . .	5	1,795,016	2,016,891	+221,875	+12.36
Spencer, . . . . .	6	2,292,200	1,760,098	-532,102	-23.21
West Brookfield, . . . . .	4	210,864	204,289	-6,575	-3.12
Worcester, . . . . .	16	3,132,263	3,270,022	+137,759	+4.40
Other cities and towns,*	72	13,665,676	16,954,207	+3,288,531	+24.06
TOTALS, . . . . .	523	\$75,420,266	\$89,245,667	+\$13,825,401	+18.33

\* Distributed through the different counties.

## RECAPITULATION. THE STATE.

<b>THE STATE.</b>	<b>523</b>	<b>\$75,420,266</b>	<b>\$89,245,667</b>	<b>+\$13,825,401</b>	<b>+18.33</b>
Berkshire, . . . . .	6	1,250,492	2,289,341	+1,038,849	+83.08
Bristol, . . . . .	9	957,850	1,186,329	+228,479	+23.85
Essex, . . . . .	268	28,097,553	30,781,015	+2,683,462	+9.55
Middlesex, . . . . .	72	13,560,896	14,041,048	+480,152	+3.54
Norfolk, . . . . .	39	4,763,422	6,791,918	+2,028,496	+42.58
Plymouth, . . . . .	69	12,065,941	19,472,746	+7,406,805	+61.39
Suffolk, . . . . .	16	1,958,826	1,752,073	-206,753	-10.55
Worcester, . . . . .	49	12,765,286	12,931,197	+165,911	+1.30

## CLOTHING.

<b>MIDDLESEX.</b>					
Cambridge, . . . . .	3	\$270,700	\$414,582	+\$143,882	+53.14
Lowell, . . . . .	3	237,789	240,423	+2,634	+1.11
<b>SUFFOLK.</b>					
Boston, . . . . .	85	16,620,956	20,053,252	+3,432,296	+20.65
<b>WORCESTER.</b>					
Worcester, . . . . .	4	644,000	627,993	-16,007	-2.49
Other cities and towns,* . . . . .	31	2,561,081	4,611,187	+2,050,106	+80.05
<b>TOTALS, . . . . .</b>	<b>126</b>	<b>\$20,384,626</b>	<b>\$25,947,437</b>	<b>+\$5,562,811</b>	<b>+27.29</b>

\* Distributed through the different counties.

**GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.**  
**COMPARISON OF GOODS MADE. SELECTED INDUSTRIES: BY**  
**COUNTIES, CITIES, AND TOWNS. 1885, 1890—Continued.**

**CLOTHING—RECAPITULATION. THE STATE—Concluded.**

THE STATE, COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
THE STATE.	126	\$20,384,526	\$25,947,437	+\$5,562,911	+27.29
BARNSTABLE, . . . .	1	212,354	166,746	-45,608	-21.48
BERKSHIRE, . . . .	2	121,272	158,815	+37,543	+30.96
BRISTOL, . . . .	1	52,000	111,180	+59,180	+113.81
ESSEX, . . . .	12	1,264,648	1,971,572	+706,924	+55.90
HAMPDEN, . . . .	2	33,000	23,600	-9,400	-28.48
HAMPSHIRE, . . . .	2	530,000	774,074	+244,074	+46.05
MIDDLESEX, . . . .	12	676,227	980,355	+304,128	+44.97
NORFOLK, . . . .	2	50,000	66,305	+16,305	+32.61
SUFFOLK, . . . .	86	16,649,425	20,071,702	+3,422,277	+20.55
WORCESTER, . . . .	6	795,600	1,623,088	+827,488	+104.01

**COTTON GOODS.**

<b>BERKSHIRE.</b>					
North Adams, . . . .	4	\$643,948	\$833,138	+\$918,190	+29.38
<b>BRISTOL.</b>					
FALL RIVER, . . . .	33	14,982,426	22,793,805	+7,811,379	+52.14
NEW BEDFORD, . . . .	5	4,371,389	6,916,642	+2,545,253	+58.23
TAUNTON, . . . .	8	2,088,690	2,685,160	+596,470	+28.56
<b>ESSEX.</b>					
LAWRENCE, . . . .	5	3,964,140	4,948,075	+983,935	+24.82
<b>HAMPDEN.</b>					
HOLYOKE, . . . .	4	2,602,371	3,704,711	+1,102,340	+42.36
<b>MIDDLESEX.</b>					
LOWELL, . . . .	8	12,779,583	18,644,740	+5,865,157	+45.89
<b>WORCESTER.</b>					
West Boylston, . . . .	4	444,174	553,654	+109,480	+24.65
Other cities and towns,*	71	20,230,397	24,678,008	+4,447,611	+21.98
TOTALS, . . . .	142	\$62,107,118	\$85,757,933	+\$23,650,815	+38.08

\* Distributed through the different counties.

**RECAPITULATION. THE STATE.**

THE STATE.	142	\$62,107,118	\$85,757,933	+\$23,650,815	+38.08
BERKSHIRE, . . . .	10	2,909,641	3,318,175	+408,534	+14.04
BRISTOL, . . . .	63	22,225,327	33,501,755	+11,276,428	+50.74
ESSEX, . . . .	11	7,638,693	8,912,592	+1,273,899	+16.68
FRANKLIN, . . . .	3	411,592	414,242	+2,650	+0.64
HAMPDEN, . . . .	13	6,918,862	9,111,660	+2,192,798	+31.69
HAMPSHIRE, . . . .	2	1,106,640	1,967,135	+860,495	+77.76
MIDDLESEX, . . . .	11	13,877,222	19,846,268	+5,969,046	+43.01
NORFOLK, . . . .	5	375,801	304,887	-70,914	-18.87
PLYMOUTH, . . . .	3	171,262	184,309	+13,047	+7.62
WORCESTER, . . . .	31	6,472,078	8,196,910	+1,724,832	+26.65

## GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.

## COMPARISON OF GOODS MADE. SELECTED INDUSTRIES: BY COUNTIES, CITIES, AND TOWNS. 1885, 1890—Continued.

## FOOD PREPARATIONS.

THE STATE, COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
BERKSHIRE.					
North Adams, . . .	4	\$153,263	\$122,750	—\$30,513	—19.91
PITTSFIELD, . . .	3	136,359	150,594	+14,235	+10.44
BRISTOL.					
FALL RIVER, . . .	4	710,400	750,670	+40,270	+5.67
NEW BEDFORD, . . .	7	315,066	420,785	+105,729	+33.56
ESSEX.					
GLOUCESTER, . . .	31	2,338,745	2,877,931	+544,186	+23.32
LAWRENCE, . . .	6	1,122,082	1,422,186	+300,104	+26.75
NEWBURYPORT, . . .	5	242,038	232,200	—9,838	—4.06
HAMPDEN.					
SPRINGFIELD, . . .	7	1,462,439	1,402,393	—60,046	—4.11
NORTHAMPTON, . . .	4	185,715	130,991	—54,724	—29.47
MIDDLESEX.					
CAMBRIDGE, . . .	10	13,028,600	15,560,866	+2,532,266	+19.44
LOWELL, . . .	6	248,934	149,451	—99,543	—39.98
SOMERVILLE, . . .	10	9,000,335	6,768,148	—2,232,187	—24.80
SUFFOLK.					
BOSTON, . . .	99	19,569,578	29,851,550	+10,281,972	+52.54
CHELSEA, . . .	6	415,800	380,265	—35,535	—8.55
WORCESTER.					
FITCHBURG, . . .	4	338,101	535,561	+197,460	+58.40
WORCESTER, . . .	11	990,507	1,098,296	+107,789	+10.88
Other cities and towns,*	115	4,767,294	4,697,841	—69,453	—1.46
TOTALS, . . .	332	* \$55,020,306	\$66,552,478	+\$11,532,172	+20.96

\* Distributed through the different counties.

## RECAPITULATION. THE STATE.

THE STATE.	332	\$55,020,306	\$66,552,478	+\$11,532,172	+20.96
BARNSTABLE, . . .	1	8,000	14,985	+6,985	+87.31
BERKSHIRE, . . .	19	546,083	464,756	—81,327	—14.89
BRISTOL, . . .	16	1,296,484	1,323,946	+27,462	+2.12
ESSEX, . . .	58	5,140,408	5,942,308	+801,905	+15.60
FRANKLIN, . . .	7	154,975	222,324	+67,349	+43.46
HAMPDEN, . . .	14	2,166,501	2,071,861	—94,640	—4.37
HAMPSHIRE, . . .	8	298,785	233,643	—65,142	—21.80
MIDDLESEX, . . .	52	22,975,233	23,315,385	+340,152	+1.48
NORFOLK, . . .	13	388,292	387,379	—913	—0.24
PLYMOUTH, . . .	6	380,248	424,770	+44,522	+11.71
SUFFOLK, . . .	104	19,985,378	30,231,815	+10,246,437	+51.27
WORCESTER, . . .	84	1,679,924	1,919,306	+239,382	+14.25

GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.  
COMPARISON OF GOODS MADE. SELECTED INDUSTRIES: BY  
COUNTIES, CITIES, AND TOWNS. 1885, 1890—Continued.

LEATHER.

THE STATE, COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
ESSEX.					
Danvers, . . . . .	5	\$313,500	\$555,567	+242,067	+77.21
LYNN, . . . . .	16	2,238,865	2,477,579	+238,714	+10.66
Peabody, . . . . .	28	2,650,232	3,178,590	+528,358	+19.94
SALEM, . . . . .	20	2,970,620	2,469,821	-500,799	-16.86
MIDDLESEX.					
LOWELL, . . . . .	5	624,854	1,137,957	+513,103	+82.12
Winchester, . . . . .	6	2,158,650	1,427,759	-730,891	-33.86
WOBURN, . . . . .	17	4,618,017	4,139,483	-478,534	-10.36
SUFFOLK.					
BOSTON, . . . . .	18	596,646	735,302	+138,656	+23.24
WORCESTER.					
WORCESTER, . . . . .	7	676,663	796,981	+120,318	+17.78
Other cities and towns,*	47	3,860,104	4,868,247	+1,008,143	+26.12
TOTALS, . . . . .	169	\$20,708,151	\$21,787,286	+\$1,079,135	+5.21

\* Distributed through the different counties.

RECAPITULATION. THE STATE.

THE STATE.	169	\$20,708,151	\$21,787,286	+\$1,079,135	+5.21
BERKSHIRE, . . . . .	4	178,209	130,800	-47,349	-26.57
BRISTOL, . . . . .	3	227,630	334,523	+106,893	+46.96
ESSEX, . . . . .	74	8,639,017	9,453,576	+814,559	+9.43
FRANKLIN, . . . . .	3	112,000	104,224	-7,776	-6.94
HAMPDEN, . . . . .	5	161,139	184,076	+22,937	+14.23
HAMPSHIRE, . . . . .	2	23,918	36,240	+12,322	+51.52
MIDDLESEX, . . . . .	36	8,446,122	8,058,114	-388,008	-4.59
NORFOLK, . . . . .	4	786,653	1,030,859	+244,206	+31.04
SUFFOLK, . . . . .	21	720,614	824,398	+103,784	+14.40
WORCESTER, . . . . .	16	1,340,549	1,544,505	+203,956	+15.21
Other counties, . . . . .	2	72,300	85,911	+13,611	+18.83

MACHINES AND MACHINERY.

<b>BRISTOL.</b>					
FALL RIVER, . . . . .	16	\$384,450	\$689,589	+\$305,139	+79.37
TAUNTON, . . . . .	4	473,474	920,351	+446,877	+94.38
<b>ESSEX.</b>					
LAWRENCE, . . . . .	14	622,392	933,150	+310,758	+49.93
LYNN, . . . . .	7	76,485	112,864	+36,379	+47.56
SALEM, . . . . .	5	117,817	236,750	+118,933	+100.95
<b>HAMPDEN.</b>					
HOLYOKE, . . . . .	6	480,325	445,047	-35,278	-7.34
SPRINGFIELD, . . . . .	7	330,482	853,416	+522,934	+158.23

GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.  
COMPARISON OF GOODS MADE. SELECTED INDUSTRIES: BY  
COUNTIES, CITIES, AND TOWNS. 1885, 1890—Continued.

MACHINES AND MACHINERY—Concluded.

THE STATE, COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
MIDDLESEX.					
CAMBRIDGE, . . . .	4	\$323,459	\$255,282	—\$68,177	—21.08
LOWELL, . . . .	17	1,095,096	2,349,228	+1,254,132	+114.52
SUFFOLK.					
BOSTON, . . . .	55	3,756,848	6,655,277	+2,898,429	+77.15
WORCESTER..					
FITCHBURG, . . . .	10	479,112	853,558	+374,446	+78.15
WORCESTER, . . . .	39	2,754,300	4,107,898	+1,353,598	+49.14
Other cities and towns,*	71	3,833,438	6,302,939	+409,501	+12.25
TOTALS, . . . .	255	\$14,727,678	\$24,715,319	+\$9,987,641	+67.82

\* Distributed through the different counties.

RECAPITULATION. THE STATE.

THE STATE.	255	\$14,727,678	\$24,715,319	+\$9,987,641	+67.82
BERKSHIRE, . . . .	6	153,256	244,080	+90,824	+59.26
BRISTOL, . . . .	26	933,590	1,720,169	+786,579	+84.25
ESSEX, . . . .	28	878,214	1,344,946	+466,732	+53.15
FRANKLIN, . . . .	6	1,310,170	2,363,570	+1,053,400	+80.40
HAMPDEN, . . . .	16	1,109,434	1,773,009	+663,575	+59.81
HAMPSHIRE, . . . .	2	110,000	70,753	—39,247	—35.68
MIDDLESEX, . . . .	36	1,943,170	3,302,167	+1,358,997	+69.94
NORFOLK, . . . .	5	174,379	315,404	+141,025	+80.87
PLYMOUTH, . . . .	5	76,253	154,518	+78,265	+102.64
SUFFOLK, . . . .	57	3,769,852	6,787,275	+2,967,423	+78.71
WORCESTER, . . . .	68	4,269,360	6,689,428	+2,420,068	+56.68

METALS AND METALLIC GOODS.

<b>BRISTOL.</b>					
Attleborough, . . . .	4	\$154,844	\$79,170	—\$75,674	—48.87
NEW BEDFORD, . . . .	6	705,389	1,142,384	+436,995	+61.95
TAUNTON, . . . .	5	1,261,909	1,526,474	+264,565	+20.97
<b>ESSEX.</b>					
Haverhill, . . . .	4	148,675	152,684	+4,009	+2.70
LAWRENCE, . . . .	6	253,560	340,467	+86,907	+34.27
LYNN, . . . .	4	73,800	126,070	+52,270	+70.83
SALEM, . . . .	4	103,500	45,910	—57,590	—55.64
<b>HAMPDEN.</b>					
HOLYOKE, . . . .	5	312,982	357,042	+44,060	+14.08
SPRINGFIELD, . . . .	18	779,008	1,157,991	+378,983	+48.65
<b>HAMPSHIRE.</b>					
NORTHAMPTON, . . . .	4	225,106	386,296	+161,190	+71.61

**GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.**  
**COMPARISON OF GOODS MADE. SELECTED INDUSTRIES: BY**  
**COUNTIES, CITIES, AND TOWNS. 1885, 1890—Continued.**

**METALS AND METALLIC GOODS—Concluded.**

THE STATE, COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
<b>MIDDLESEX.</b>					
CAMBRIDGE, . . . . .	6	\$512,702	\$821,890	+\$309,188	+60.31
LOWELL, . . . . .	9	364,973	425,858	+60,885	+16.68
<b>NORFOLK.</b>					
QUINCY, . . . . .	4	260,925	581,880	+320,955	+122.99
<b>PLYMOUTH.</b>					
Plymouth, . . . . .	6	391,565	400,382	+8,817	+2.25
<b>SUFFOLK.</b>					
BOSTON, . . . . .	65	4,195,944	6,188,825	+1,992,881	+47.50
CHELSEA, . . . . .	4	233,884	423,498	+189,614	+81.07
<b>WORCESTER.</b>					
FITCHBURG, . . . . .	6	122,012	231,426	+109,414	+89.67
WORCESTER, . . . . .	32	7,414,186	10,556,290	+3,142,104	+42.38
Other cities and towns,*	81	5,772,774	8,065,311	+2,292,537	+39.71
<b>TOTALS, . . . . .</b>	<b>268</b>	<b>\$23,287,738</b>	<b>\$33,009,798</b>	<b>+\$9,722,060</b>	<b>+41.75</b>

\* Distributed through the different counties.

**RECAPITULATION. THE STATE.**

<b>THE STATE.</b>	<b>268</b>	<b>\$23,287,738</b>	<b>\$33,009,798</b>	<b>+\$9,722,060</b>	<b>+41.75</b>
BARNSTABLE, . . . . .	1	13,000	4,550	—3,450	—65.00
BERKSHIRE, . . . . .	2	73,603	208,923	+135,320	+183.85
BRISTOL, . . . . .	23	2,567,610	3,041,877	+474,267	+18.93
ESSEX, . . . . .	25	980,398	1,612,034	+631,636	+64.43
FRANKLIN, . . . . .	7	743,276	1,007,940	+264,664	+35.61
HAMPDEN, . . . . .	21	1,216,115	1,751,423	+535,308	+44.02
HAMPSHIRE, . . . . .	7	509,106	732,776	+223,670	+43.93
MIDDLESEX, . . . . .	29	1,869,437	3,068,755	+1,199,318	+64.15
NORFOLK, . . . . .	14	1,142,491	1,537,325	+394,834	+34.56
PLYMOUTH, . . . . .	22	1,647,592	1,892,377	+244,785	+14.86
SUFFOLK, . . . . .	69	4,429,828	6,612,323	+2,182,495	+49.27
WORCESTER, . . . . .	48	8,105,282	11,539,495	+3,434,213	+42.37

**PAPER AND PAPER GOODS.**

<b>BERKSHIRE.</b>					
Dalton, . . . . .	4	\$823,983	\$939,206	+\$115,223	+13.98
Lee, . . . . .	5	1,258,454	868,560	—389,894	—30.98
<b>ESSEX.</b>					
LAWRENCE, . . . . .	4	1,313,790	1,245,339	—68,451	—5.21
<b>HAMPDEN.</b>					
HOLYOKE, . . . . .	18	6,143,088	7,023,233	+880,145	+14.33
SPRINGFIELD, . . . . .	8	646,279	1,591,957	+945,678	+146.33



## GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.

COMPARISON OF GOODS MADE. SELECTED INDUSTRIES: BY  
COUNTIES, CITIES, AND TOWNS. 1885, 1890—Concluded.

## PAPER AND PAPER GOODS—Concluded.

THE STATE, COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
SUFFOLK.					
BOSTON, . . . . .	4	\$599,374	\$1,119,000	+\$519,626	+86.00
Other cities and towns,* . .	52	8,010,979	10,241,700	+2,230,721	+27.85
TOTALS, . . . . .	95	\$18,795,947	\$23,028,995	+\$4,233,048	+22.52

\* Distributed through the different counties.

## RECAPITULATION. THE STATE.

THE STATE.	95	\$18,795,947	\$23,028,995	+\$4,233,048	+22.52
BERKSHIRE, . . . . .	13	2,651,895	2,621,117	-130,778	-4.93
BRISTOL, . . . . .	2	57,030	59,437	+2,407	+4.22
ESSEX, . . . . .	5	1,563,790	1,595,339	+31,549	+2.02
FRANKLIN, . . . . .	4	1,202,958	1,079,557	-123,401	-10.26
HAMPDEN, . . . . .	34	8,185,066	10,715,986	+2,530,920	+30.92
HAMPSHIRE, . . . . .	6	640,630	608,481	-32,149	-5.02
MIDDLESEX, . . . . .	13	976,885	1,192,288	+215,403	+22.05
NORFOLK, . . . . .	4	647,185	1,036,386	+389,201	+60.14
PLYMOUTH, . . . . .	1	22,000	15,000	-7,000	-31.82
SUFFOLK, . . . . .	5	600,374	1,189,000	+588,626	+98.04
WORCESTER, . . . . .	8	2,248,134	3,016,404	+768,270	+34.17

## WOOLLEN AND WORSTED GOODS.

ESSEX.					
LAWRENCE, . . . . .	5	\$2,916,351	\$5,430,608	+\$2,514,257	+86.21
HAMPDEN.					
HOLYOKE, . . . . .	4	1,845,428	2,210,156	+364,728	+19.76
MIDDLESEX.					
LOWELL, . . . . .	7	2,744,047	2,556,598	-187,449	-6.83
WORCESTER.					
FITCHBURG, . . . . .	4	1,984,478	2,456,766	+472,293	+23.80
Leicester, . . . . .	10	783,590	955,371	+171,781	+21.92
Millbury, . . . . .	5	348,765	818,019	+469,254	+134.55
Uxbridge, . . . . .	6	516,636	957,369	+440,733	+85.31
WORCESTER, . . . . .	5	724,962	991,362	+266,400	+36.75
Other cities and towns,*	96	22,797,566	26,009,516	+3,211,950	+14.09
TOTALS, . . . . .	142	\$34,661,818	\$42,385,765	+\$7,723,947	+22.28

\* Distributed through the different counties.

## RECAPITULATION. THE STATE.

THE STATE.	142	\$34,661,818	\$42,385,765	+\$7,723,947	+22.28
BERKSHIRE, . . . . .	11	2,124,437	3,629,245	+1,504,808	+70.83
BRISTOL, . . . . .	3	659,590	648,344	-11,246	-1.70
ESSEX, . . . . .	17	6,653,106	8,446,737	+1,793,631	+26.96
FRANKLIN, . . . . .	1	126,235	100,124	-26,111	-20.68
HAMPDEN, . . . . .	12	2,591,557	3,036,037	+444,480	+17.15
HAMPSHIRE, . . . . .	6	1,161,621	1,240,641	+79,020	+6.80
MIDDLESEX, . . . . .	20	8,974,329	9,662,863	+688,534	+7.67
NORFOLK, . . . . .	10	1,959,827	2,389,882	+430,055	+21.94
PLYMOUTH, . . . . .	2	357,290	527,636	+170,346	+47.68
SUFFOLK, . . . . .	1	16,000	34,438	+18,438	+115.24
WORCESTER, . . . . .	59	10,037,826	12,669,818	+2,631,992	+26.22

## COMPARISON OF GOODS MADE: BY SELECTED CITIES AND TOWNS.

1885, 1890.

[In this presentation, the value of goods made and work done is shown for certain establishments by selected cities and towns, and is followed by a recapitulation for the State and counties. The number of establishments given does not, in any instance, represent the *total* number of establishments in any city or town; it includes those only which reported the value of goods made and work done in the Census year 1885 and also in 1890, thus admitting of direct comparison between the two years. The relative increase or decrease in 1890 as compared with 1885 is given with its equivalent percentage. In order not to disclose the business of individual manufacturers certain establishments are omitted from the town showing, being included, however, in the line "other towns," and in the State recapitulation.]

COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
<b>BARNSTABLE.</b>	18	\$283,011	\$225,639	-\$57,372	-20.27
Barnstable, . . . .	3	12,100	13,760	+1,660	+13.72
Provincetown, . . . .	5	21,786	26,585	+4,799	+22.03
Other towns, . . . .	10	249,125	185,294	-63,831	-25.62
<b>BERKSHIRE.</b>	117	\$15,091,055	\$21,825,764	+\$6,734,709	+44.63
Adams, . . . . .	10	2,765,068	3,227,343	+462,275	+16.72
Cheshire, . . . . .	4	90,909	80,134	-10,775	-11.85
Dalton, . . . . .	5	1,045,783	1,207,208	+161,425	+15.44
Great Barrington, . . . .	5	536,269	759,230	+222,961	+41.58
Lee, . . . . .	9	1,287,494	894,552	-392,942	-30.52
Lenox, . . . . .	4	93,151	73,518	-19,633	-21.08
North Adams, . . . . .	29	6,424,495	11,247,463	+4,822,968	+75.07
PITTSFIELD, . . . . .	24	1,635,747	2,802,202	+1,166,455	+71.31
West Stockbridge, . . . .	5	69,689	47,357	-22,332	-32.05
Other towns, . . . . .	22	1,142,450	1,486,757	+344,307	+30.14
<b>BRISTOL.</b>	315	\$41,793,094	\$56,923,525	+\$15,130,431	+36.20
Attleborough, . . . . .	40	2,399,000	2,728,052	+329,052	+13.72
Dighton, . . . . .	5	841,655	271,289	-70,366	-20.60
Easton, . . . . .	10	789,329	828,071	+39,342	+4.98
FALL RIVER, . . . . .	67	19,764,263	28,613,984	+8,849,721	+44.78
Manassfield, . . . . .	13	816,289	726,064	-90,235	-11.05
NEW BEDFORD, . . . . .	65	9,174,684	13,176,081	+4,001,347	+43.61
North Attleborough, . . . .	40	2,361,734	2,596,036	+234,302	+9.92
Raynham, . . . . .	4	138,499	147,556	+9,057	+6.54
TAUNTON, . . . . .	54	5,106,218	6,864,613	+1,758,395	+34.44
Other towns, . . . . .	17	901,423	971,239	+69,816	+7.75

## GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.

## COMPARISON OF GOODS MADE: BY SELECTED CITIES AND TOWNS. 1885, 1890 — Continued.

COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
DUKES.	1	\$72,000	\$85,000	+\$13,000	+18.06
ESSEX.	744	\$77,765,334	\$103,981,511	+\$26,116,177	+33.58
Amesbury, . . . .	27	2,295,665	2,045,054	+349,389	+15.22
Andover, . . . .	28	3,149,681	3,905,174	+755,493	+23.99
Beverly, . . . .	24	4,075,598	3,677,139	-398,459	-9.78
Bradford, . . . .	4	469,890	705,874	+235,984	+50.22
Danvers, . . . .	23	1,391,376	1,858,827	+467,451	+33.60
Essex, . . . .	5	570,807	569,550	-1,347	-0.24
Georgetown, . . . .	9	469,200	404,540	-64,660	-13.78
GLOUCESTER, . . . .	65	3,655,250	4,320,643	+665,393	+18.20
Haverhill, . . . .	120	7,961,445	11,201,543	+3,240,098	+40.70
Ipswich, . . . .	6	794,127	843,304	+49,177	+6.19
LAWRENCE, . . . .	62	16,423,493	22,459,911	+6,036,418	+36.75
LYNN, . . . .	152	15,906,923	29,936,711	+14,029,788	+88.20
Marblehead, . . . .	18	677,156	780,670	+103,514	+15.29
Merrimac, . . . .	17	575,178	677,479	+102,301	+17.79
Methuen, . . . .	6	1,359,597	1,714,848	+355,251	+26.13
NEWBURYPORT, . . . .	28	2,968,518	3,344,821	+376,303	+12.68
Peabody, . . . .	42	4,051,646	4,577,065	+525,419	+12.97
Rockport, . . . .	5	316,933	431,070	+114,137	+36.01
Rowley, . . . .	8	307,975	276,112	-31,863	-10.35
SALEM, . . . .	63	6,483,647	6,100,465	-383,182	-5.91
Salisbury, . . . .	8	523,800	896,300	+372,500	+71.60
Saugus, . . . .	5	809,986	657,956	-152,030	-18.77
West Newbury, . . . .	4	83,800	79,776	-4,024	-4.80
Other towns, . . . .	15	2,443,553	1,813,679	-629,874	-25.78
FRANKLIN.	58	\$5,048,002	\$6,537,145	+\$1,489,143	+29.50
Deerfield, . . . .	6	209,000	232,453	+23,453	+11.22
Greenfield, . . . .	10	376,192	596,209	+210,017	+55.83
Montague, . . . .	12	2,067,884	2,162,302	+94,418	+4.57
Orange, . . . .	5	1,144,170	2,106,985	+962,815	+84.15
Shelburne, . . . .	6	368,888	452,212	+83,324	+22.59
Other towns, . . . .	19	881,868	996,984	+115,116	+13.05
HAMPDEN.	244	\$31,828,666	\$39,870,027	+\$8,041,361	+25.26
Chester, . . . .	5	181,420	219,557	+38,137	+21.02
CHICOPPEE, . . . .	16	3,288,357	4,727,245	+1,438,888	+43.76
HOLYOKE, . . . .	49	12,216,127	15,407,675	+3,191,548	+26.13
Monson, . . . .	6	635,572	733,133	+97,561	+15.35
Palmer, . . . .	8	1,821,139	2,070,379	+249,240	+13.69
SPRINGFIELD, . . . .	108	8,437,897	9,898,648	+1,460,751	+17.31
Westfield, . . . .	33	2,045,231	2,763,899	+718,668	+35.14
West Springfield, . . . .	5	557,513	1,001,901	+444,388	+79.71
Other towns, . . . .	19	2,645,420	3,047,590	+402,170	+15.20

## GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.

## COMPARISON OF GOODS MADE: BY SELECTED CITIES AND TOWNS. 1885, 1890—Continued.

COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
<b>HAMPSHIRE.</b>	<b>79</b>	<b>\$8,168,564</b>	<b>\$10,506,834</b>	<b>+\$2,425,270</b>	<b>+29.69</b>
Amherst, . . . . .	8	409,767	477,061	+67,297	+16.42
Easthampton, . . . . .	8	1,519,611	1,745,910	+226,299	+14.89
NORTHAMPTON, . . . . .	27	2,846,644	4,017,905	+1,171,261	+41.15
South Hadley, . . . . .	6	600,005	725,784	+125,779	+20.96
Ware, . . . . .	7	1,770,429	2,408,329	+637,900	+36.03
Williamsburg, . . . . .	7	458,347	541,977	+83,630	+18.25
Other towns, . . . . .	16	563,761	676,865	+113,104	+20.06
<b>MIDDLESEX.</b>	<b>523</b>	<b>\$102,104,824</b>	<b>\$122,450,398</b>	<b>+\$20,345,574</b>	<b>+19.98</b>
Acton, . . . . .	6	230,500	318,820	+88,320	+38.32
Arlington, . . . . .	4	162,988	188,718	+25,730	+15.79
Billerica, . . . . .	4	871,889	1,085,594	+213,705	+24.51
CAMBRIDGE, . . . . .	84	22,147,210	28,637,497	+6,540,287	+29.53
Chelmsford, . . . . .	8	468,042	590,251	+122,209	+26.11
Everett, . . . . .	7	754,960	641,795	-113,165	-14.99
Frammingham, . . . . .	11	2,999,637	3,204,957	+205,300	+6.84
Groton, . . . . .	4	323,054	415,789	+92,735	+28.71
Holliston, . . . . .	11	597,293	522,059	-75,234	-12.60
Hopkinton, . . . . .	4	1,240,087	1,513,747	+273,660	+22.07
Hudson, . . . . .	10	2,317,624	2,423,967	+106,343	+4.59
LOWELL, . . . . .	103	24,981,444	34,506,083	+9,523,639	+38.12
MALDEN, . . . . .	13	3,361,554	6,121,271	+2,759,717	+82.10
MARLBOROUGH, . . . . .	21	4,992,006	5,075,582	+83,576	+1.67
Medford, . . . . .	10	382,742	443,874	+61,132	+15.97
Natick, . . . . .	21	2,057,561	1,577,273	-480,288	-23.34
NEWTON, . . . . .	18	1,149,580	1,582,499	+432,919	+37.66
Pepperell, . . . . .	6	1,071,561	935,188	-136,373	-12.73
Reading, . . . . .	7	166,203	367,705	+202,502	+122.58
SOMERVILLE, . . . . .	27	10,140,136	8,778,468	-1,361,668	-13.43
Stoneham, . . . . .	16	1,832,890	2,258,626	+425,736	+23.23
Townsend, . . . . .	6	178,879	176,224	-2,655	-1.48
Wakefield, . . . . .	11	1,779,353	2,330,109	+550,756	+30.95
WALTHAM, . . . . .	10	3,707,081	4,864,450	+1,157,369	+31.22
Watertown, . . . . .	11	1,231,136	1,469,542	+238,406	+19.36
Westford, . . . . .	5	641,750	967,611	+325,861	+50.78
Weston, . . . . .	4	163,207	194,790	+31,583	+19.35
Winchester, . . . . .	12	2,256,494	1,644,336	-612,158	-27.13
WOBURN, . . . . .	31	5,434,639	4,813,409	-621,230	-11.43
Other towns, . . . . .	38	4,464,304	4,751,164	+286,860	+6.43
<b>NANTUCKET.</b>	<b>1</b>	<b>\$2,560</b>	<b>\$1,570</b>	<b>-\$990</b>	<b>-38.67</b>
<b>NORFOLK.</b>	<b>210</b>	<b>\$17,172,700</b>	<b>\$20,668,453</b>	<b>+\$3,495,753</b>	<b>+20.36</b>
Braintree, . . . . .	12	896,048	1,342,424	+446,376	+49.82
Brookline, . . . . .	5	118,916	254,645	+135,729	+114.14
Canton, . . . . .	10	2,329,924	2,119,388	-210,536	-9.04

## GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.

## COMPARISON OF GOODS MADE: BY SELECTED CITIES AND TOWNS. 1885, 1890—Continued.

COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (—), IN 1890	
		1885	1890	Amounts	Percent- ages
NORFOLK — Con.					
Dedham, . . . . .	6	\$612,446	\$580,950	—\$31,496	—5.14
Foxborough, . . . . .	6	241,813	413,840	+172,027	+71.14
Franklin, . . . . .	12	972,114	1,474,302	+502,188	+51.66
Hyde Park, . . . . .	13	1,259,471	1,450,912	+191,441	+15.20
Medway, . . . . .	4	518,540	637,967	+119,427	+23.03
Needham, . . . . .	4	108,829	131,714	+22,885	+21.03
QUINCY, . . . . .	46	2,148,987	2,702,566	+553,579	+25.76
Randolph, . . . . .	7	98,130	232,357	+134,207	+136.76
Sharon, . . . . .	5	117,503	107,534	—9,969	—8.48
Stoughton, . . . . .	13	1,364,937	1,467,622	+102,685	+7.52
Walpole, . . . . .	8	1,115,513	1,153,346	+37,833	+3.39
Wellesley, . . . . .	5	360,060	380,636	+20,576	+5.71
Weymouth, . . . . .	28	2,717,984	3,512,377	+794,393	+29.23
Wrentham, . . . . .	9	301,969	438,751	+136,782	+45.30
Other towns, . . . . .	17	1,889,516	2,267,142	+377,626	+19.99
PLYMOUTH.					
	164	\$17,264,111	\$26,493,632	+\$9,229,521	+53.46
Abington, . . . . .	12	1,579,068	2,002,946	+423,878	+26.84
BROCKTON, . . . . .	68	8,752,631	13,324,983	+4,572,352	+52.24
East Bridgewater, . . . . .	5	143,000	213,130	+70,130	+49.04
Hanover, . . . . .	6	676,250	500,095	—176,155	—26.05
Middleborough, . . . . .	13	833,737	1,654,878	+821,141	+98.49
Plymouth, . . . . .	13	1,759,008	2,972,409	+1,213,401	+68.98
Rockland, . . . . .	11	1,230,479	1,463,062	+232,583	+18.90
Scituate, . . . . .	4	29,683	30,500	+817	+2.75
Whitman, . . . . .	9	1,322,999	2,973,056	+1,650,057	+124.72
Other towns, . . . . .	23	937,256	1,358,573	+421,317	+44.95
SUFFOLK.					
	837	\$79,199,977	\$109,505,213	+\$30,305,236	+38.26
BOSTON, . . . . .	814	78,055,039	106,826,901	+28,771,862	+36.86
CHELSEA, . . . . .	21	1,078,970	2,621,216	+1,542,246	+142.94
Other towns, . . . . .	2	65,968	57,096	—8,872	—13.45
WORCESTER.					
	506	\$65,040,758	\$88,970,557	+\$23,929,799	+36.80
Ashburnham, . . . . .	8	840,811	518,982	—321,829	—38.28
Athol, . . . . .	18	803,797	940,745	+136,948	+17.04
Blackstone, . . . . .	4	3,349,592	7,556,754	+4,207,162	+125.60
Brookfield, . . . . .	5	835,593	1,388,650	+553,057	+66.19
Charlton, . . . . .	6	220,711	496,791	+276,080	+125.09
Clinton, . . . . .	9	3,160,947	4,507,181	+1,346,234	+42.59
Douglas, . . . . .	4	472,500	289,360	—183,140	—38.76
Dudley, . . . . .	5	1,291,012	1,492,607	+201,595	+15.62
FITCHBURG, . . . . .	49	5,302,363	6,778,989	+1,476,626	+27.85
Gardner, . . . . .	15	1,074,943	1,256,034	+181,091	+16.85
Grafton, . . . . .	8	1,415,111	1,717,160	+302,049	+21.34
Holden, . . . . .	5	339,921	445,812	+105,891	+31.15

GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF GOODS MADE: BY SELECTED CITIES AND  
TOWNS. 1885, 1890 — Concluded.

COUNTIES, CITIES, AND TOWNS.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
WORCESTER — Con.					
Lancaster, . . . . .	5	\$104,524	\$68,078	—\$36,446	—34.87
Leicester, . . . . .	14	1,001,310	1,144,246	+142,936	+14.27
Leominster, . . . . .	29	1,410,028	3,008,158	+1,598,132	+113.34
Milford, . . . . .	18	2,156,605	2,428,337	+271,732	+12.60
Millbury, . . . . .	17	1,165,195	1,612,693	+447,498	+38.41
Northborough, . . . . .	5	228,050	647,867	+419,817	+184.09
Northbridge, . . . . .	5	954,406	1,544,019	+589,613	+61.78
Oxford, . . . . .	4	321,356	461,516	+140,160	+43.61
Southbridge, . . . . .	13	1,498,298	2,684,369	+1,186,071	+79.16
Spencer, . . . . .	15	3,033,840	2,404,793	—629,047	—20.73
Sutton, . . . . .	5	571,379	360,870	—210,509	—36.84
Templeton, . . . . .	9	434,455	356,676	—77,779	—17.90
Upton, . . . . .	4	1,106,783	1,216,441	+109,658	+9.91
Uxbridge, . . . . .	8	638,405	1,127,479	+489,074	+76.61
Warren, . . . . .	8	1,049,490	996,725	—52,765	—5.03
Webster, . . . . .	4	228,004	527,413	+299,409	+131.32
Westborough, . . . . .	8	1,616,336	1,503,413	—110,923	—6.86
West Boylston, . . . . .	7	522,334	600,973	+78,639	+15.06
West Brookfield, . . . . .	4	210,864	204,289	—6,575	—3.12
Westminster, . . . . .	4	168,646	176,686	+18,040	+11.37
Winchendon, . . . . .	12	941,591	1,161,149	+219,558	+23.32
WORCESTER, . . . . .	189	21,608,531	27,596,759	+6,088,228	+28.31
Other towns, . . . . .	33	5,573,029	4,746,544	—826,485	—14.83

RECAPITULATION.

THE STATE, AND COUNTIES.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
THE STATE.					
	3,817	\$460,834,656	\$603,032,268	+\$142,197,612	+30.86
BARNSTABLE, . . . . .	18	283,011	225,639	—57,372	—20.27
BERKSHIRE, . . . . .	117	15,091,055	21,825,764	+6,734,709	+44.63
BRISTOL, . . . . .	315	41,793,094	56,923,525	+15,130,431	+36.20
DUKES, . . . . .	1	72,000	85,000	+13,000	+18.06
ESSEX, . . . . .	744	77,765,334	103,881,511	+26,116,177	+33.58
FRANKLIN, . . . . .	58	5,048,002	6,537,145	+1,489,143	+29.50
HAMPDEN, . . . . .	244	31,828,666	39,870,027	+8,041,361	+25.26
HAMPSHIRE, . . . . .	79	8,168,564	10,593,834	+2,425,270	+29.69
MIDDLESEX, . . . . .	523	102,104,824	122,450,398	+20,345,574	+19.93
NANTUCKET, . . . . .	1	2,560	1,570	—990	—38.67
NORFOLK, . . . . .	210	17,172,700	20,668,453	+3,495,753	+20.36
PLYMOUTH, . . . . .	164	17,264,111	26,493,632	+9,229,521	+53.46
SUFFOLK, . . . . .	837	79,199,977	109,505,213	+30,305,236	+38.26
WORCESTER, . . . . .	506	65,040,758	83,970,567	+18,929,799	+29.10

## COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE.

1890, 1891.

[In this presentation articles of goods made by the same establishments are shown for 1890 and 1891. For instance, the quantity and value of muriatic acid made in 1890 in certain establishments are compared with the returns of the same establishments for 1891. The quantity of goods made given does not, in any instance, represent the *total* amount made in the State. The figures given in the table below are derived solely from the returns of those establishments which reported the quantities and values of goods made for 1890 and 1891, upon the same basis for both years, thus admitting of direct comparison. The order is alphabetical, with subsidiary classifications under such general titles as boots, boxes, cloth, etc. To avoid the use of small amounts in the "Average Price per Basis" columns, the units of measurement returned by the manufacturers have been increased when necessary; as, for instance, single pounds have been increased to 100 pounds or to tons, single feet to 1,000 feet,

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Acid, muriatic . . . .	100 pounds	35,547	\$36,520	25,478	\$29,451
2	Acid, nitric . . . .	100 pounds	4,777	22,301	4,882	19,838
3	Acid, sulphuric . . . .	100 pounds	119,900	95,951	87,295	80,125
4	Ale, . . . .	barrels	236,096	1,270,142	223,331	1,210,657
5	Awls, . . . .	gross	24,336	21,819	24,085½	19,434
6	Awnings, . . . .	. . . .	2,422	20,948	2,585	23,374
7	Axes, . . . .	dozen	11,140	78,686	28,027	196,904
8	Barrels, sugar (new), . .	hundred	7,866	267,609	9,247	333,574
9	Beds, spring . . . .	. . . .	17,817	42,019	21,481	46,177
10	Beef, dressed . . . .	100 pounds	7,843	65,404	7,061	55,478
11	Belting, leather . . . .	100 pounds	3,016	189,754	3,049	194,222
12	Bicycles, . . . .	. . . .	4,188	170,765	7,832	300,910
13	Blankets, bed . . . .	pairs	89,911	327,196	93,064	337,900
14	Blankets, horse . . . .	pairs	173,125	251,571	148,555	227,768
15	Boards, box . . . .	M feet	7,210	70,054	9,151	84,764
16	Boilers, steam . . . .	. . . .	900	450,451	854	496,709
	Boots:					
17	Boys', . . . .	pairs	156,378	187,082	128,664	147,916
18	Children's, . . . .	pairs	484,554	297,127	467,326	283,666
19	Men's, . . . .	pairs	765,999	1,365,737	641,049	1,079,610
20	Misses', . . . .	pairs	375,268	322,712	376,281	322,590
21	Women's, . . . .	pairs	3,368,486	3,903,277	3,187,689	3,995,307
22	Youths', . . . .	pairs	80,854	52,649	54,738	46,908
23	Boots, n. s.,* . . . .	pairs	3,960,892	6,274,696	3,081,412	4,945,423
	Boxes:					
24	Boot and shoe, . . . .	hundred	13,004	220,681	9,780	187,148
25	Cigar, . . . .	hundred	10,068	96,354	10,727	101,584
26	Paper, . . . .	hundred	473,222	1,018,098	474,633	984,862
27	Wooden, . . . .	hundred	75,230	1,190,307	71,815	1,192,493

\* Not specified as to particular kind.

# COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE.

1890, 1891.

single yards to 100 yards, single gallons to 100 gallons, etc. The price per single pound, single foot, single yard, single gallon, etc., may be readily obtained by dividing the figures given by 100, 1,000, etc. The method of reading this table is as follows: In 1890, a certain number of establishments manufactured 3,554,700 pounds of muriatic acid and in 1891 these same establishments made 2,547,800 pounds; this was a decrease of 1,006,900 pounds, or 28.33 per cent. The value of the quantity made in 1890 was \$36,520; in 1891 it amounted to \$29,451 a decrease of \$7,069, or 19.36 per cent in the latter year. The average selling price per 100 pounds was \$1.03 in 1890, and \$1.16 in 1891, an increase of 13 cents, or 12.62 per cent. The italic letters, *n. s.*, denote the abbreviation of the words "not specified." Attention is called to the foot-notes which specify cases of indefiniteness in the designations of various kinds of goods made.]

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
-10,069	-28.33	-\$7,069	-19.36	\$1.03	\$1.16	+\$0.13	+12.62	1
+105	+2.20	-2,468	-11.04	4.67	4.06	-0.61	-13.06	2
-32,605	-27.19	-15,826	-16.49	0.80	0.92	+0.12	+15.00	3
-12,765	-5.41	-59,485	-4.68	5.38	5.42	+0.04	+0.74	4
-1,250½	-4.93	-2,385	-10.93	0.86	0.81	-0.05	-5.81	5
+163	+6.73	+2,426	+11.58	8.65	9.04	+0.39	+4.51	6
+16,887	+151.59	+118,268	+150.40	7.06	7.03	-0.03	-0.42	7
+1,381	+17.56	+65,965	+24.65	34.02	36.07	+2.05	+6.03	8
+3,664	+20.56	+4,158	+9.90	2.36	2.15	-0.21	-8.90	9
-782	-9.98	-9,926	-15.18	8.34	7.86	-0.48	-5.76	10
+33	+1.09	+4,468	+2.35	62.92	63.70	+0.78	+1.24	11
+3,644	+87.01	+130,145	+76.21	40.77	38.42	-2.35	-5.76	12
+3,153	+3.51	+10,704	+3.27	3.64	3.63	-0.01	-0.27	13
-24,540	-14.17	-23,803	-9.46	1.45	1.53	+0.08	+5.52	14
+1,941	+26.92	+14,710	+21.00	9.72	9.26	-0.46	-4.73	15
-46	-5.11	+46,258	+10.27	500.50	581.63	+81.13	+16.21	16
-27,714	-17.72	-39,166	-20.94	1.20	1.15	-0.05	-4.17	17
-17,228	-3.56	-13,461	-4.53	0.61	0.61	=	=	18
-124,950	-16.31	-286,127	-20.95	1.78	1.68	-0.10	-5.62	19
+1,013	+0.27	-112	-0.03	0.86	0.86	=	=	20
-180,797	-5.37	+92,030	+2.36	1.16	1.25	+0.09	+7.76	21
-6,116	-10.05	-6,741	-12.80	0.87	0.84	-0.03	-3.45	22
-879,480	-22.20	-1,329,273	-21.18	1.58	1.60	+0.02	+1.27	23
-3,224	-24.79	-33,533	-15.20	16.97	19.14	+2.17	+12.79	24
+659	+6.55	+5,230	+5.43	9.57	9.47	-0.10	-1.04	25
+1,411	+0.30	-33,236	-3.26	2.15	2.07	-0.08	-3.72	26
-3,415	-4.54	+2,186	+0.18	15.82	16.61	+0.79	+4.99	27

1 No change in average price.



GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued.

	ARTICLES	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Braces, bit . . . . .		100,246	\$81,197	117,268	\$88,080
2	Bread, white . . . . .	100 loaves	13,964	81,952	14,660	87,437
3	Brick, common . . . . .	thousand	123,989	783,125	131,683	820,225
4	Brick, face . . . . .	thousand	5,116	75,976	8,948	58,751
5	Brogans, . . . . .	pairs	469,694	439,553	506,944	480,962
6	Brooms, house . . . . .	dozen	14,551	28,764	22,560	33,770
7	Broughams, . . . . .		87	26,850	36	26,181
8	Brushes, hair . . . . .	dozen	28,656	67,500	31,096	78,939
9	Brushes, horse . . . . .	dozen	8,850	36,750	8,880	40,160
10	Brushes, machine . . . . .	dozen	824½	18,334	796	25,322
11	Buggies, . . . . .		943	136,729	989	140,289
12	Buttons, collar (gilt), . . . . .	100 gross	120	88,000	135	96,000
13	Buttons, covered . . . . .	100 gross	4,641	245,706	5,526	243,350
14	Buttons, shoe . . . . .	100 gross	72,247	143,499	61,803	135,435
15	Carpeting, Brussels . . . . .	yards	2,009,130	1,730,393	2,157,470	1,909,344
16	Carpeting, Wilton . . . . .	yards	439,036	656,061	427,215	654,427
17	Carriages, . . . . .		4,748	686,065	4,412	665,139
18	Carryalls, . . . . .		280	51,400	238	48,837
19	Cases, piano . . . . .		10,558	346,884	7,259	267,092
20	Cassimeres, . . . . .	yards	6,110,447	6,898,304	6,175,235	6,857,873
	Castings:					
21	Brass, . . . . .	100 pounds	5,379	101,518	6,678	128,707
22	Composition, . . . . .	100 pounds	4,194	85,200	3,801	73,753
23	Iron, . . . . .	tons	30,072	1,729,873	31,872½	1,769,944
24	Machine, . . . . .	tons	9,616	509,004	8,919½	478,131
25	Castings, n. s.,* . . . . .	tons	8,720½	493,453	8,930½	521,233
26	Chairs, cane-seat . . . . .	hundred	7,422	515,673	7,207	510,329
27	Chairs, wood-seat . . . . .	hundred	4,252	147,600	4,252	140,600
28	Cheroots, . . . . .	hundred	20,351	17,570	31,337	33,737
29	Cheviot, . . . . .	yards	122,987	122,122	261,625	240,708
30	Cider, . . . . .	100 gallons	7,220	112,593	11,127	113,797
31	Cider, . . . . .	barrels	2,944	11,656	5,328	13,029
32	Cigars, . . . . .	thousand	39,298	1,747,285	42,114½	1,826,423
33	Cloaking, . . . . .	yards	466,120	557,229	408,736	499,495
	Cloth:					
34	Awning, . . . . .	100 pounds	8,587	233,935	8,227	217,043
35	Cotton, . . . . .	100 pounds	766,187	19,599,778	833,786	19,265,303
36	Print, . . . . .	100 yards	239,760	791,013	256,098	743,470
37	Print, . . . . .	100 pounds	288,256	6,960,714	292,535	6,311,008
38	Printed, . . . . .	100 yards	1,772,238	11,541,147	2,240,484	12,190,806
39	Printed, . . . . .	100 pounds	15,300	375,387	12,723	281,413
40	Codfish, salt (dried), . . . . .	100 pounds	40,086	215,335	37,706	239,962
41	Coffee, roasted . . . . .	100 pounds	114,097	2,800,372	127,370	3,130,829
42	Combs, dressing (horn), . . . . .	gross	31,050	145,250	30,717	144,600
43	Confectionery, . . . . .	100 pounds	131,464	1,443,833	126,493	1,367,837
44	Cord, sash . . . . .	100 pounds	12,943	311,952	11,310	260,879

\* Not specified as to particular kind.

GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+17,012	+16.97	+86,883	+8.48	\$0.81	\$0.75	-\$0.06	-7.41	1
+696	+1.98	+5,485	+6.69	5.87	5.96	+0.09	+1.63	2
+7,694	+6.21	+37,100	+1.74	6.32	6.23	-0.09	-1.42	3
-1,168	-22.83	-17,225	-22.67	14.85	14.88	+0.03	+0.20	4
+37,250	+7.93	+41,409	+9.42	0.94	0.95	+0.01	+1.06	5
+8,009	+55.04	+5,006	+17.40	1.98	1.50	-0.48	-24.24	6
-1	-2.70	-669	-2.49	725.68	727.25	+1.57	+0.22	7
+2,440	+8.61	+11,439	+16.95	2.36	2.54	+0.18	+7.63	8
+30	+0.34	+3,410	+9.28	4.15	4.52	+0.37	+8.92	9
-28½	-3.46	+6,988	+39.11	22.24	31.81	+9.57	+43.03	10
+46	+1.88	+3,560	+2.60	144.99	141.85	-3.14	-2.17	11
+15	+12.50	+8,000	+9.09	733.33	711.11	-22.22	-3.03	12
+885	+19.07	-2,356	-0.96	52.94	44.04	-8.90	-18.81	13
-10,444	-14.46	-8,064	-5.62	1.99	2.19	+0.20	+10.05	14
+148,340	+7.33	+178,951	+10.34	0.86	0.88	+0.02	+2.33	15
-11,821	-2.69	-1,634	-0.25	1.49	1.53	+0.04	+2.68	16
-336	-7.08	-20,926	-3.05	144.50	150.76	+6.26	+4.33	17
-42	-15.00	-2,563	-4.99	183.57	205.20	+21.63	+11.78	18
-3,299	-31.25	-79,792	-23.00	32.86	36.79	+3.93	+11.96	19
+64,788	+1.06	-40,431	-0.59	1.13	1.11	-0.02	-1.77	20
+1,299	+24.15	+27,189	+26.78	18.87	19.27	+0.40	+2.12	21
-393	-9.37	-11,447	-13.44	20.31	19.40	-0.91	-4.48	22
+1,800½	+5.99	+39,971	+2.31	57.52	55.53	-1.99	-3.46	23
-696½	-7.25	-30,873	-6.07	52.93	53.61	+0.68	+1.28	24
+209½	+2.40	+27,780	+5.63	56.58	58.37	+1.79	+3.16	25
-215	-2.90	-5,344	-1.04	69.48	70.81	+1.33	+1.91	26
1=	1=	-7,000	-4.74	34.71	33.07	-1.64	-4.72	27
+10,986	+53.98	+16,167	+92.01	0.86	1.08	+0.22	+25.58	28
+138,638	+112.73	+118,586	+97.10	0.99	0.92	-0.07	-7.07	29
+3,907	+54.11	+1,204	+1.07	15.59	10.23	-5.36	-34.38	30
+2,384	+80.98	+1,373	+11.78	3.96	2.45	-1.51	-38.13	31
+2,816½	+7.17	+79,138	+4.53	44.46	43.37	-1.09	-2.45	32
-67,384	-12.31	-57,734	-10.36	1.20	1.22	+0.02	+1.67	33
-360	-4.19	-16,892	-7.22	27.24	26.38	-0.86	-3.16	34
+37,599	+4.91	-334,475	-1.71	25.58	23.97	-1.61	-6.29	35
+16,338	+6.81	-47,543	-6.01	3.30	2.90	-0.40	-12.12	36
+4,279	+1.48	-649,706	-9.33	24.15	21.57	-2.58	-10.68	37
+468,246	+26.42	+649,661	+5.63	6.51	5.44	-1.07	-16.44	38
-2,577	-16.84	-93,974	-25.03	24.54	22.12	-2.42	-90.14	39
-2,380	-5.94	+24,627	+11.44	5.37	6.36	+0.99	+18.44	40
+13,273	+11.63	+330,457	+11.80	24.54	24.58	+0.04	+0.16	41
-333	-1.07	-650	-0.45	4.68	4.71	+0.03	+0.64	42
-4,971	-3.78	-75,996	-5.26	10.98	10.81	-0.17	-1.55	43
-1,633	-12.62	-51,073	-16.37	24.10	23.07	-1.03	-4.27	44

<sup>1</sup> No change in quantity.

**GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.**  
**COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE**  
**— 1890, 1891 — Continued.**

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Cottonades, . . . . .	100 pounds	14,032	\$386,885	17,152	\$409,508
2	Crackers, . . . . .	100 pounds	33,371	249,903	30,667	237,094
3	Crackers, . . . . .	barrels	109,882	321,045	113,526	315,404
4	Cream of tartar, . . . .	100 pounds	12,045	344,990	14,422	372,386
5	Denim, . . . . .	100 pounds	80,571	1,838,859	83,608	1,876,969
6	Domest, . . . . .	100 pounds	3,414	106,214	6,503	196,383
7	Dories, . . . . .	dozen	1,285	21,430	1,506	24,276
8	Dress goods, cotton . . .	100 pounds	29,936	1,136,440	22,059	780,658
9	Dress goods, woollen . .	100 yards	76,524	3,764,728	78,312	4,036,522
10	Dress goods, worsted . .	100 yards	177,702	4,262,982	204,821	4,796,533
11	Drill, . . . . .	100 yards	89,560	601,320	94,107	623,299
12	Duck, cotton . . . . .	100 pounds	31,249	637,717	31,647	599,242
13	Dusters, feather . . . .	dozen	10,110	64,387	9,979	57,479
14	Envelopes, . . . . .	thousand	1,050,188	1,202,416	1,423,873	1,229,742
15	Extracts, flavoring . . .	gross	2,200	37,000	2,235	37,408
16	Felt, . . . . .	100 feet	97,273	601,927	99,604	583,305
17	Fertilizers, . . . . .	tons	9,938½	279,401	9,000	274,861
18	Files, . . . . .	dozen	12,001	27,456	13,958	31,380
19	Fish, boneless . . . . .	100 pounds	167,136	961,455	161,011	1,010,945
20	Flannel, . . . . .	100 yards	103,775	2,559,737	120,614	2,910,600
21	Flannel, cotton . . . . .	100 pounds	148,596	3,408,662	141,926	3,173,417
22	Forgings, iron . . . . .	tons	2,109½	145,130	1,774¾	115,624
23	Furnaces, . . . . .	dozen	2,680	185,752	2,804	195,066
24	Gingham, . . . . .	100 yards	639,177	4,640,620	609,342	4,628,305
25	Glue, . . . . .	100 pounds	35,299	401,941	36,516	392,567
26	Gold leaf, . . . . .	packs	13,823	97,024	14,367	112,576
27	Granite, dressed . . . .	cubic feet	13,618	30,414	14,460	34,598
28	Granite, polished . . . .	cubic feet	14,900	72,500	16,312	75,435
29	Granite, rough . . . . .	cubic feet	61,436	75,603	55,820	66,110
30	Grease, curriers' . . . .	100 pounds	26,022	114,161	25,265	112,796
31	Grease, rendered . . . .	100 pounds	36,266	144,804	37,961	154,714
32	Hairpins, horn . . . . .	gross	37,950	72,150	48,000	96,000
33	Hair, plastering . . . . .	tons	644	24,380	650¾	25,501
34	Halters, . . . . .	dozen	5,200	10,700	6,200	15,800
35	Ham, . . . . .	100 pounds	35,877	310,268	39,530	337,920
36	Hammocks, . . . . .	dozen	3,380½	37,641	2,872¾	33,207
37	Harnesses, . . . . .	dozen	8,787	167,829	8,572	155,615
	Hats:					
38	Felt (men's), . . . . .	dozen	14,430	271,218	19,147	305,580
39	Fur, . . . . .	dozen	66,574	636,936	62,586	580,579
40	Silk, . . . . .	dozen	896½	52,848	731	43,232

**GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.**  
**COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE**  
**—1890, 1891—Continued.**

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+3,120	+22.23	+882,623	+21.36	\$27.57	\$27.37	-\$0.20	-0.73	1
-2,704	-8.10	-12,809	-5.13	7.49	7.73	+0.24	+3.20	2
+3,644	+3.32	-5,641	-1.76	2.92	2.78	-0.14	-4.79	3
+2,377	+19.73	+27,306	+7.94	28.64	25.82	-2.82	-9.85	4
+3,037	+3.77	+38,110	+2.07	22.82	22.45	-0.37	-1.62	5
+3,089	+90.48	+90,119	+84.85	81.11	80.19	-0.92	-2.96	6
+221	+17.20	+2,846	+13.28	16.68	16.12	-0.56	-3.36	7
-7,877	-26.31	-355,782	-31.31	37.96	35.39	-2.57	-6.77	8
+1,788	+2.34	+271,794	+7.22	49.20	51.54	+2.34	+4.76	9
+27,119	+15.26	+533,551	+12.52	23.99	23.42	-0.57	-2.38	10
+4,547	+5.08	+21,979	+3.66	6.71	6.62	-0.09	-1.34	11
+898	+1.27	-38,475	-6.03	20.41	18.94	-1.47	-7.20	12
-131	-1.30	-6,908	-10.73	6.37	5.76	-0.61	-9.58	13
+373,685	+35.58	+27,326	+2.27	1.14	0.86	-0.28	-24.56	14
+35	+1.59	+408	+1.10	16.82	16.74	-0.08	-0.48	15
+2,331	+2.40	-18,622	-3.09	6.19	5.86	-0.33	-5.33	16
-938½	-9.44	-4,540	-1.62	28.11	30.54	+2.43	+8.64	17
+1,957	+16.31	+3,924	+14.29	2.29	2.25	-0.04	-1.75	18
-6,125	-3.66	+49,490	+5.15	5.75	6.28	+0.53	+9.22	19
+16,839	+16.23	+350,863	+13.71	24.67	24.13	-0.54	-2.19	20
-6,670	-4.49	-230,245	-6.76	22.91	22.86	-0.55	-2.40	21
-334½	-15.87	-29,506	-20.33	68.80	65.15	-3.65	-5.31	22
+124	+4.63	+9,304	+5.01	69.31	69.56	+0.25	+0.36	23
-29,835	-4.67	-12,315	-0.27	7.26	7.60	+0.34	+4.68	24
+1,217	+3.45	-9,374	-2.33	11.39	10.75	-0.64	-5.62	25
+544	+3.94	+15,552	+16.03	7.02	7.84	+0.82	+11.68	26
+862	+6.33	+4,184	+13.76	2.23	2.39	+0.16	+7.17	27
+1,412	+9.48	+2,935	+4.05	4.87	4.62	-0.25	-5.13	28
-6,616	-9.14	-9,493	-12.56	1.23	1.18	-0.05	-4.07	29
-757	-2.91	-1,365	-1.20	4.39	4.46	+0.07	+1.69	30
+1,695	+4.67	+9,910	+6.84	3.99	4.08	+0.09	+2.26	31
+10,050	+26.48	+23,850	+33.06	1.90	2.00	+0.10	+5.26	32
+6½	+1.01	+1,141	+4.68	37.83	39.20	+1.37	+3.62	33
+1,000	+19.23	+5,100	+47.66	2.06	2.55	+0.49	+23.79	34
+3,653	+10.18	+27,652	+8.91	8.65	8.55	-0.10	-1.16	35
-507½	-15.02	-4,434	-11.78	11.13	11.56	+0.43	+3.86	36
-215	-2.45	-12,214	-7.28	19.10	18.15	-0.95	-4.97	37
+4,717	+32.69	+34,362	+12.67	15.80	15.96	-2.84	-15.11	38
-3,988	-5.99	-56,357	-8.85	9.57	9.28	-0.29	-3.03	39
-165½	-18.46	-9,616	-18.20	58.95	59.14	+0.19	+0.32	40

GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
	Hats:— Con.					
1	Straw, . . . . .	dozen	503,651	\$1,074,030	522,140	\$1,117,087
2	Wool, . . . . .	dozen	55,714	333,138	50,372	297,617
3	Heeling, . . . . .	100 sheets	5,529	54,182	7,031	65,488
4	Hoels, . . . . .	100 pairs	110,389	290,227	100,017	244,423
5	Hosiery, cotton . . . .	100 pairs	218,280	1,185,726	276,448	1,494,206
6	Hosiery, silk . . . . .	dozen pairs	8,533	172,059	7,631	160,323
7	Hosiery, woollen . . . .	dozen pairs	180,656	263,660	174,995	230,479
8	Ice, . . . . .	tons	90,341½	299,110	70,089	233,618
9	Ice cream, . . . . .	gallons	37,725	60,511	34,105	52,205
10	Iron, bar . . . . .	tons	14,005	525,380	12,637	494,166
11	Isinglass, . . . . .	100 pounds	2,131	110,930	2,604	128,241
12	Jackets, cardigan . . . .	dozen	3,600	48,900	1,220	22,200
13	Jackets, women's . . . .	"	900	9,000	3,195	26,522
14	Jean, corset . . . . .	100 pounds	4,264	107,889	5,713	130,084
15	Kegs, nail . . . . .	hundred	3,268	40,850	2,845	34,961
16	Knives, shoe . . . . .	100 dozen	417	32,150	347	28,338
17	Lager beer, . . . . .	barrels	866,137	2,312,998	389,208½	2,463,440
18	Lard, . . . . .	100 pounds	35,083	218,593	48,275	318,725
19	Lasts, boot and shoe . . .	100 pairs	6,796	358,988	5,830	316,961
20	Lathes, . . . . .	"	2,289	770,043	1,886	646,097
21	Lawn, . . . . .	100 yards	90,382	413,042	57,685	300,975
22	Lawn, . . . . .	100 pounds	12,240	726,635	14,099	936,376
	Leather:					
23	Buff, . . . . .	sides	205,030	485,787	189,050	446,393
24	Calfskin, . . . . .	dozen	25,833½	405,466	34,166½	558,765
25	Card, . . . . .	sides	14,200	47,000	13,300	44,400
26	Dongola, . . . . .	dozen	24,190	253,930	42,341	417,186
27	Goatskin, . . . . .	100 feet	15,418	235,592	9,614	141,666
28	Goatskin, . . . . .	dozen	74,510	829,231	71,844	697,475
29	Goatskin (pebbled), . . .	dozen	10,560	105,600	8,550	79,950
30	Grain, . . . . .	100 feet	86,041	1,021,478	101,331	943,729
31	Grain, . . . . .	sides	323,823	777,248	253,681	559,995
32	Kid, . . . . .	dozen	32,613	403,871	25,692	277,478
33	Kid (glazed), . . . . .	dozen	59,000	656,000	72,000	760,000
34	Kip, . . . . .	100 feet	22,122	214,099	12,876	128,584
35	Morocco, . . . . .	dozen	19,869	78,575	19,724	82,718
36	Sheepskin, . . . . .	dozen	203,848	969,499	190,957	1,022,625
37	Sole, . . . . .	sides	157,560	488,436	102,000	304,500
38	Split (finished), . . . .	tons	4,810	1,711,506	4,376½	1,477,342
39	Split (rough), . . . . .	100 pounds	7,934	75,866	5,936	52,205
40	Upper, . . . . .	100 feet	15,537	170,906	9,904	85,572
41	Leather, n. s.,* . . . .	sides	922,116	1,732,133	808,220	1,380,555

\* Not specified as to particular kind.

GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+18,489	+3.67	+443,067	+4.01	\$2.13	\$2.14	+40.01	+0.47	1
-5,342	-9.59	-35,521	-10.66	5.98	5.91	-0.07	-1.17	2
+1,502	+27.17	+11,306	+20.87	9.80	9.31	-0.49	-5.00	3
-10,372	-9.40	-45,804	-15.78	2.63	2.44	-0.19	-7.22	4
+58,188	+26.66	+308,480	+26.02	5.43	5.41	-0.02	-0.37	5
-902	-10.57	-11,736	-6.82	20.16	21.01	+0.85	+4.22	6
-5,661	-3.13	-33,181	-12.58	1.46	1.32	-0.14	-9.59	7
-20,252½	-22.42	-65,492	-21.90	3.31	3.33	+0.02	+0.60	8
-3,620	-9.60	-8,306	-13.73	1.60	1.53	-0.07	-4.38	9
-1,368	-9.77	-31,214	-5.94	37.51	39.10	+1.59	+4.24	10
+473	+22.20	+17,311	+15.61	52.06	49.25	-2.81	-5.40	11
-2,880	-66.11	-26,700	-54.80	13.58	18.20	+4.62	+34.02	12
+2,295	+255.00	+17,522	+194.69	10.00	8.30	-1.70	-17.00	13
+1,449	+33.98	+22,195	+20.57	25.30	22.77	-2.53	-10.00	14
-423	-12.94	-5,889	-14.42	12.50	12.29	-0.21	-1.68	15
-70	-16.77	-3,812	-11.86	77.10	81.67	+4.57	+5.93	16
+23,071½	+6.30	+170,442	+7.37	6.32	6.38	+0.06	+0.95	17
+13,182	+37.56	+100,132	+45.81	6.23	6.60	+0.37	+5.94	18
-966	-14.21	-42,027	-11.71	52.82	54.37	+1.55	+2.93	19
-403	-17.61	-123,946	-16.10	336.41	342.58	+6.17	+1.83	20
-32,697	-36.18	-112,067	-27.13	4.57	5.22	+0.65	+14.22	21
+1,859	+15.19	+209,741	+28.86	59.37	66.41	+7.04	+11.86	22
-15,980	-7.79	-39,394	-8.11	2.37	2.36	-0.01	-0.42	23
+8,333½	+32.26	+153,299	+37.81	15.70	16.35	+0.65	+4.14	24
-900	-6.34	-2,600	-5.53	3.31	3.34	+0.03	-0.91	25
+18,151	+75.04	+163,256	+64.29	10.50	9.85	-0.65	-6.19	26
-5,804	-37.64	-93,926	-39.87	15.28	14.74	-0.54	-3.53	27
-2,666	-3.58	-131,756	-15.89	11.13	9.71	-1.42	-12.76	28
-2,010	-19.03	-25,650	-24.29	10.00	9.35	-0.65	-6.50	29
+15,290	+17.77	-77,747	-7.61	11.87	9.31	-2.56	-21.57	30
-70,142	-21.66	-217,253	-27.95	2.40	2.21	-0.19	-7.92	31
-6,921	-21.22	-126,393	-31.30	12.38	10.80	-1.58	-12.76	32
+13,000	+22.03	+104,000	+15.85	11.12	10.56	-0.56	-5.04	33
-9,246	-41.80	-85,515	-39.94	9.68	9.99	+0.31	+3.20	34
-145	-0.73	+4,148	+5.27	3.95	4.19	+0.24	+6.08	35
-12,891	-6.32	+53,126	+5.48	4.76	5.36	+0.60	+12.61	36
-65,560	-35.26	-183,936	-37.66	3.10	2.99	-0.11	-3.55	37
-433½	-9.02	-234,164	-13.68	355.82	337.58	-18.24	-5.13	38
-1,998	-25.18	-23,661	-31.19	9.56	8.79	-0.77	-8.05	39
-5,633	-36.26	-85,334	-49.93	11.00	8.64	-2.36	-21.45	40
-113,896	-12.35	-351,578	-20.30	1.88	1.71	-0.17	-9.04	41

**GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.**  
**COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE**  
**— 1890, 1891 — Continued.**

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Leather-board, . . . .	tons	2,501½	\$218,247	2,227½	\$193,922
2	Lines, cotton . . . .	100 pounds	4,248	91,700	4,620	100,500
3	Linings, rubber boot . .	100 yards	5,850	307,000	5,500	303,000
4	Linings, rubber boot . .	100 pounds	2,977	211,000	3,620	253,400
5	Logwood, extract of . .	100 pounds	15,000	82,502	14,584	95,393
6	Looms, . . . .		4,094	250,206	3,580	253,203
7	Lumber, spruce . . . .	M feet	41,122½	656,047	40,069	632,281
<b>Machines:</b>						
8	Balling, . . . .		80	3,550	46	4,875
9	Beating-out, . . . .		12	6,000	18	7,200
10	Box-matching, . . . .		11	825	9	670
11	Buffing, . . . .		150	15,000	175	17,500
12	Card grinders, . . . .		28	1,405	23	1,335
13	Carding (wool), . . . .		77	30,800	57	22,800
14	Cutting (feed), . . . .		1,202	6,628	1,476	7,506
15	Cutting (gear), . . . .		16	12,751	23	18,913
16	Cutting (leather), . . . .		12	2,400	8	1,600
17	Cutting (metal), . . . .		36	1,600	33	1,450
18	Cutting (saw), . . . .		12	1,200	6	500
19	Drawing, . . . .		150	62,500	200	64,210
20	Drilling, . . . .		1,500	16,500	1,300	14,000
21	Drying (wool), . . . .		20	9,500	22	9,000
22	Feeders, . . . .		283	30,205	336	34,000
23	Folding (paper), . . . .		63	42,905	40	30,693
24	Grinding, . . . .		286	14,515	327	19,140
25	Heeling, . . . .		24	6,000	48	12,000
26	Milling, . . . .		203	96,925	215	104,019
27	Mortising, . . . .		69	7,295	81	9,578
28	Moulding, . . . .		51	5,814	60	6,641
29	Paper, . . . .		14	212,640	13	235,361
30	Planing, . . . .		101	33,965	72	23,724
31	Printing, . . . .		15	87,848	10	35,816
32	Rolling, . . . .		26	2,210	35	2,350
33	Ruling, . . . .		1	180	4	600
34	Sawing, . . . .		171	17,183	141	14,292
35	Scouring (heel), . . . .		90	7,200	80	6,400
36	Scouring (leather), . . . .		18	7,020	10	3,750
37	Sewing, . . . .		105,002	1,880,005	103,184	1,869,513
38	Sizing (box), . . . .		10	800	7	490
39	Shaping, . . . .		50	6,250	45	5,600
40	Spinning (frame), . . . .		16	9,600	14	8,800
41	Splitting (wood), . . . .		5	375	3	240
42	Spool, . . . .		4	963	6	1,426
43	Trimming, . . . .		106	5,660	107	5,620
44	Turning (shoe), . . . .		80	5,060	49	2,710

**GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.**  
**COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE**  
**— 1890, 1891 — Continued.**

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
-274½	-10.96	-24,325	-11.15	\$87.25	\$87.07	-\$0.18	-0.21	1
+372	+8.76	+8,800	+9.60	21.59	21.75	+0.16	+0.74	2
-350	-5.98	-4,000	-1.30	52.48	55.09	+2.61	+4.97	3
+643	+21.60	+42,400	+20.09	70.88	70.00	-0.88	-1.24	4
-466	-3.11	+12,891	+15.68	5.50	6.56	+1.06	+19.27	5
-514	-12.55	+2,997	+1.20	61.12	70.73	+9.61	+15.72	6
-1,053½	-2.56	-23,766	-3.62	15.95	15.78	-0.17	-1.07	7
+16	+53.33	+1,325	+37.32	118.33	105.98	-12.35	-10.44	8
+6	+50.00	+1,200	+20.00	500.00	400.00	-100.00	-20.00	9
-2	-18.18	-155	-18.79	75.00	74.44	-0.56	-0.75	10
+25	+16.67	+2,500	+16.67	100.00	100.00	1=	1=	11
-5	-17.86	-70	-4.98	50.18	58.04	+7.86	+15.66	12
-20	-25.97	-8,000	-25.97	400.00	400.00	1=	1=	13
+274	+22.80	+968	+14.60	5.51	5.15	-0.36	-6.53	14
+7	+43.75	+6,162	+48.33	796.94	822.80	+25.86	+3.18	15
-4	-33.33	-800	-33.33	200.00	200.00	1=	1=	16
-3	-8.33	-150	-9.38	44.44	43.94	-0.50	-1.13	17
-6	-50.00	-700	-58.33	100.00	83.33	-16.67	-16.67	18
+50	+33.33	+1,710	+2.74	416.67	321.05	-95.62	-22.95	19
-200	-13.33	-2,500	-15.15	11.00	10.77	-0.23	-2.09	20
+2	+10.00	-500	-5.26	475.00	409.09	-65.91	-13.88	21
+33	+18.73	+3,795	+12.56	106.73	101.19	-5.54	-5.19	22
-23	-36.51	-12,222	-28.49	681.03	767.08	+86.05	+12.64	23
+61	+22.93	+4,325	+29.19	55.70	58.53	+2.83	+5.08	24
+24	+100.00	+6,000	+100.00	250.00	250.00	1=	1=	25
+12	+5.91	+7,094	+7.32	477.46	483.81	+6.35	+1.33	26
+12	+17.39	+2,283	+31.30	105.72	118.25	+12.53	+11.85	27
+9	+17.65	+827	+14.22	114.00	110.68	-3.32	-2.91	28
-1	-7.14	+22,721	+10.69	15,188.57	18,104.69	+2,916.12	+19.20	29
-29	-28.71	-10,241	-30.15	336.29	329.50	-6.79	-2.02	30
-5	-33.33	-2,032	-5.37	2,523.20	3,581.60	+1,058.40	+41.95	31
+9	+34.62	+140	+6.33	85.00	67.14	-17.86	-21.01	32
+3	+300.00	+420	+233.33	180.00	150.00	-30.00	-16.67	33
-30	-17.54	-2,871	-16.73	100.37	101.36	+0.99	+0.99	34
-10	-11.11	-800	-11.11	80.00	80.00	1=	1=	35
-8	-44.44	-3,270	-46.58	390.00	375.00	-15.00	-3.85	36
-1,818	-1.73	+9,508	+0.51	17.71	18.12	+0.41	+2.32	37
-3	-30.00	-310	-38.75	80.00	70.00	-10.00	-12.50	38
-5	-10.00	-650	-10.40	125.00	124.44	-0.56	-0.45	39
-2	-12.50	-800	-8.33	600.00	628.57	+28.57	+4.76	40
-2	-40.00	-135	-36.00	75.00	80.00	+5.00	+6.67	41
+2	+50.00	+463	+48.08	240.75	237.67	-3.08	-1.28	42
+1	+0.94	-40	-0.71	53.40	52.52	-0.88	-1.65	43
-32	-40.00	-2,350	-46.44	63.25	56.46	-6.79	-10.74	44

1 No change in average price.



GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
	Machines: — Con.					
1	Twisting, . . . . .	. . .	22	\$21,015	24	\$26,482
2	Warping, . . . . .	. . .	14	3,800	47	11,568
3	Washing (wool), . . . . .	. . .	25	27,000	21	24,500
4	Mackerel, canned . . . . .	100 pounds	245	4,004	349	6,243
5	Mantels, wooden . . . . .	. . .	1,500	82,500	1,600	35,100
6	Mattresses, . . . . .	. . .	85,171	106,000	53,500	145,750
7	Meat, canned . . . . .	tons	500	175,000	550	180,000
8	Meat (for fertilizers), . . . . .	tons	704½	2,818	696½	2,785
	Meal:					
9	Corn, . . . . .	100 pounds	72,490	81,696	65,807	87,607
10	Corn, . . . . .	100 bushels	39,747	2,392,490	36,462	2,409,309
11	Mixed (for feed), . . . . .	100 bushels	6,100	344,650	5,030	301,800
12	Rye, . . . . .	100 bushels	806	27,910	815	29,680
13	Melton, . . . . .	yards	93,612	98,293	156,193	164,000
14	Metal, yellow . . . . .	tons	1,396½	319,057	1,096½	301,012
15	Meters, water . . . . .	. . .	7,099	169,147	7,361	172,582
	Mittens:					
16	Cashmere, . . . . .	dozen pairs	504	1,367	179	465
17	Silk, . . . . .	dozen pairs	2,774	22,251	4,102	27,044
18	Woollen, . . . . .	dozen pairs	7,734	13,924	9,294	17,821
19	Worsted, . . . . .	dozen pairs	6,500	15,050	4,500	12,350
20	Moulding, gilt . . . . .	M feet	1,000	36,000	1,000	34,000
21	Mucilage, . . . . .	gallons	27,250	51,750	30,250	61,250
	Nails:					
22	Brass, . . . . .	100 pounds	2,182	53,254	1,929	40,015
23	Cut, . . . . .	kegs	193,074½	427,043	184,615½	390,244
24	Steel, . . . . .	100 pounds	5,324	19,268	4,197	14,725
25	Zinc, . . . . .	100 pounds	856	10,387	1,264	15,441
26	Neckties, . . . . .	dozen	90,536	316,308	87,729	322,805
27	Needles, machine . . . . .	hundred	10,771	24,158	10,427	21,686
28	Needles, sewing-machine . . . . .	thousand	19,392	159,740	23,028	180,302
29	Nolls, . . . . .	100 pounds	6,611	159,330	7,614	182,469
30	Oars, . . . . .	M feet	115	6,294	232	18,723
31	Oatmeal, . . . . .	100 bushels	860	42,918	919	51,790
	Oil:					
32	Fish, . . . . .	100 gallons	2,315	66,192	2,270	74,554
33	Fish, . . . . .	barrels	4,100	57,400	9,000	99,000
34	Machine, . . . . .	barrels	650	15,000	500	10,000
35	Sperm, . . . . .	100 gallons	3,017	229,320	2,926	223,184
36	Whale, . . . . .	100 gallons	1,572	81,320	1,226	65,012
37	Organs, church . . . . .	. . .	46	127,303	52	135,012
38	Organs, reed . . . . .	. . .	5,055	244,259	3,222	156,788
39	Overalls, . . . . .	dozen	3,600	17,350	4,000	23,250
40	Overcoats, . . . . .	. . .	31,570	384,078	34,543	429,915

GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+2	+9.09	+\$5,467	+26.01	\$955.23	\$1,103.42	+\$148.19	+15.51	1
+33	+235.71	+8,198	+243.99	240.00	245.91	+5.91	+2.46	2
-4	-16.00	-2,500	-9.26	1,080.00	1,166.67	+86.67	+8.03	3
+104	+42.45	+2,239	+55.92	16.34	17.89	+1.55	+9.49	4
+100	+6.67	+2,800	+8.00	21.67	21.94	+0.27	+1.25	5
+18,329	+52.11	+39,750	+37.60	8.01	2.72	-0.29	-9.63	6
+50	+10.00	+5,000	+2.86	350.00	327.27	-22.73	-6.49	7
-8½	-1.15	-33	-1.17	4.00	4.00	1=	1=	8
-6,683	-9.22	-5,911	-7.24	1.13	1.33	+0.20	+17.70	9
-3,285	-8.26	+16,819	+0.70	60.19	66.08	+5.89	+9.79	10
-1,070	-17.54	-12,850	-12.43	56.50	60.00	+3.50	+6.19	11
+9	+2.94	+1,770	+6.34	91.21	1.22	+3.01	+3.30	12
+62,581	+66.85	+65,707	+66.85	1.05	1.05	1=	1=	13
-300½	-21.49	-18,045	-5.97	228.41	274.46	+46.05	+20.16	14
+262	+3.69	+3,435	+2.03	23.83	23.45	-0.38	-1.59	15
-325	-64.48	-902	-65.98	2.71	2.60	-0.11	-4.06	16
+1,328	+47.87	+4,793	+21.54	8.02	6.59	-1.43	-17.83	17
+1,560	+20.17	+3,897	+27.99	1.80	1.92	+0.12	+6.67	18
-2,000	-30.77	-2,400	-15.95	2.32	2.81	+0.49	+21.12	19
2=	2=	-2,000	-5.56	36.00	34.00	-2.00	-5.56	20
+3,000	+11.01	+9,500	+18.36	1.90	2.02	+0.12	+6.32	21
-253	-11.59	-13,239	-24.86	24.41	20.74	-3.67	-15.03	22
-8,459	-4.38	-36,799	-8.62	2.21	2.11	-0.10	-4.52	23
-1,127	-21.17	-4,543	-23.58	3.62	3.81	-0.11	-3.04	24
+408	+47.66	+5,054	+48.66	12.13	12.22	+0.09	+0.74	25
-2,807	-3.10	+6,497	+2.05	3.49	3.68	+0.19	+5.44	26
-344	-3.19	-2,472	-10.28	2.24	2.08	-0.16	-7.14	27
+3,636	+18.75	+20,562	+12.87	8.24	7.83	-0.41	-4.98	28
+1,003	+15.17	+23,139	+14.52	24.10	23.96	-0.14	-0.58	29
+117	+101.74	+7,429	+118.03	54.73	59.15	+4.42	+8.08	30
+59	+6.86	+8,872	+20.67	49.90	56.35	+6.45	+12.93	31
-45	-1.94	+8,362	+12.63	28.59	32.84	+4.25	+14.87	32
+4,900	+119.51	+41,800	+72.47	14.00	11.00	-3.00	-21.43	33
-150	-23.08	-5,000	-33.33	23.08	20.00	-3.08	-13.34	34
-91	-3.02	-1,136	-0.50	76.01	77.98	+1.97	+2.59	35
-346	-22.01	-16,308	-20.05	51.73	53.08	+1.30	+2.51	36
+6	+13.04	+7,709	+6.06	2,767.46	2,596.38	-171.08	-6.18	37
-1,833	-36.26	-87,471	-35.81	48.32	48.66	+0.34	+0.70	38
+400	+11.11	+5,900	+34.01	4.82	5.81	+0.99	+20.54	39
+2,973	+9.42	+45,837	+11.93	12.17	12.45	+0.28	+2.30	40

¹ No change in average price.

² No change in quantity.

GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Palls, . . . . .	hundred	14,086	\$144,728	17,933	\$170,280
2	Pantaloons, . . . . .	pairs	456,488	1,237,397	498,275	1,367,660
	Paper:					
3	Asbestos, . . . . .	100 pounds	6,000	42,000	5,500	38,500
4	Book, . . . . .	100 pounds	428,703	2,542,466	466,766	2,620,903
5	Building, . . . . .	100 pounds	59,536	155,506	56,631	145,362
6	Card, . . . . .	100 pounds	132,680	720,334	137,920	708,250
7	Carpet-lining, . . . . .	100 pounds	64,817	157,783	65,330	153,738
8	Hanging, . . . . .	100 pounds	47,757	179,530	45,560	156,791
9	Manilla, . . . . .	100 pounds	38,057	174,502	52,912	225,498
10	News, . . . . .	100 pounds	303,120	1,037,000	304,610	946,040
11	Packing, . . . . .	100 pounds	2,549	7,435	3,185	8,655
12	Surface coated, . . . . .	100 pounds	68,280	580,799	90,100	679,047
13	Wrapping, . . . . .	100 pounds	39,400	130,133	40,780	131,500
14	Writing, . . . . .	100 pounds	506,825	4,873,606	433,990	4,903,073
15	Paper, <i>n. s.</i> ,* . . . . .	100 pounds	983,831	6,501,608	1,092,529	7,073,881
16	Photographs, . . . . .	hundred	3,815	96,000	3,920	103,800
17	Pianos,* . . . . .	. . . . .	12,127	2,723,187	11,342	2,584,169
18	Pianos, upright . . . . .	. . . . .	302	87,250	389	106,620
19	Plows, . . . . .	. . . . .	3,099	46,241	3,613	48,345
20	Pork, fresh (dressed), . . . . .	100 pounds	25,200	151,200	18,450	147,600
21	Pork, salted . . . . .	100 pounds	170,750	987,875	77,500	449,750
22	Porter, . . . . .	barrels	7,951	42,932	6,803	36,623
23	Powder, baking . . . . .	100 pounds	843	12,644	992	14,290
24	Powder, washing . . . . .	100 pounds	4,375	19,005	5,126	23,862
25	Pumps, power . . . . .	. . . . .	476	56,524	454	45,621
26	Rakes, hay (hand), . . . . .	dozen	4,013½	7,285	3,098½	5,214
27	Ranges, . . . . .	. . . . .	17,364	260,840	18,187	269,772
28	Reeds, weaving . . . . .	dozen	1,790	14,144	1,750	13,910
29	Refrigerators, . . . . .	. . . . .	8,600	109,000	8,275	92,500
30	Rivets, . . . . .	tons	1,904	258,740	1,753	208,560
31	Rockaways, . . . . .	. . . . .	80	39,200	67	34,346
32	Rods, steel (Bessemer), . . . . .	tons	3,137	124,222	3,761½	349,039
33	Rollers, shade . . . . .	gross	5,515	68,935	8,000	96,000
34	Rope, hemp . . . . .	100 pounds	9,345	62,109	8,266	45,999
35	Rope, manilla . . . . .	100 pounds	104,863	1,197,175	109,876	1,068,653
36	Rope, Sisal . . . . .	100 pounds	50,264	439,821	60,683	402,631
37	Rum, . . . . .	gallons	432,620½	564,104	576,014	660,834
38	Satinet, . . . . .	100 yards	145,975	2,794,435	154,412	2,967,157
39	Satteen, . . . . .	100 yards	60,052	532,278	36,425	310,450
40	Satteen, . . . . .	100 pounds	5,422	247,248	5,815	256,622
41	Sausages, . . . . .	100 pounds	21,715	160,683	20,099	169,402
42	Schooners, . . . . .	. . . . .	14	133,500	17	198,900
43	Shafting, . . . . .	100 pounds	3,126	14,570	2,493	11,008

\* Not specified as to particular kind.

GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
—1890, 1891—Continued.

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+3,847	+27.31	+331,552	+21.80	\$10.27	\$9.83	—\$0.44	—4.28	1
+41,787	+9.15	+180,263	+10.58	2.71	2.74	+0.03	+1.11	2
—500	—8.33	—3,500	—8.33	7.00	7.00	<sup>1</sup> —	<sup>1</sup> —	3
+38,063	+8.88	+78,437	+3.09	5.93	5.62	—0.31	—5.23	4
—2,905	—4.88	—9,654	—6.21	2.61	2.58	—0.03	—1.15	5
+5,240	+3.95	—12,084	—1.68	5.43	5.14	—0.29	—5.34	6
+513	+0.79	—4,045	—2.56	2.43	2.35	—0.08	—3.29	7
—2,207	—4.62	—22,789	—12.67	3.76	3.44	—0.32	—8.51	8
+14,855	+39.03	+50,996	+29.22	4.59	4.26	—0.33	—7.19	9
+1,490	+0.49	—90,980	—8.77	3.41	3.11	—0.30	—8.80	10
+636	+24.95	+1,220	+16.41	2.92	2.72	—0.20	—6.85	11
+21,820	+31.96	+98,248	+16.92	8.51	7.54	—0.97	—11.40	12
+1,380	+3.50	+1,367	+1.06	3.30	3.22	—0.08	—2.42	13
—72,835	—14.37	+29,468	+0.60	9.62	11.80	+1.68	+17.46	14
+108,668	+11.05	+572,273	+8.80	6.61	6.47	—0.14	—2.12	15
+105	+2.75	+7,800	+8.13	25.16	26.48	+1.32	+5.25	16
—785	—6.47	—139,018	—5.10	224.56	227.84	+3.28	+1.46	17
+37	+28.81	+19,370	+22.20	268.91	274.09	—14.82	—5.13	18
+514	+16.59	+2,104	+4.55	14.92	13.38	—1.54	—10.32	19
—6,750	—26.79	—3,600	—2.38	6.00	8.00	+2.00	+33.33	20
—93,250	—54.61	—538,125	—54.47	5.79	5.80	+0.01	+0.17	21
—1,148	—14.44	—6,309	—14.70	5.40	5.38	—0.02	—0.37	22
+149	+17.67	+1,646	+13.02	14.50	14.41	—0.09	—0.62	23
+758	+17.21	+4,857	+25.56	4.84	4.65	+0.81	+7.14	24
—22	—4.62	—10,903	—19.29	118.75	100.49	—18.26	—15.38	25
—915	—0.23	—2,071	—28.43	1.82	1.68	—0.14	—7.69	26
+828	+4.74	+8,932	+3.42	15.02	14.83	—0.19	—1.26	27
—40	—2.23	—234	—1.65	7.90	7.95	+0.05	+0.63	28
—325	—3.78	—16,500	—15.14	12.67	11.18	—1.49	—11.76	29
—151	—7.93	—50,180	—19.39	135.89	118.97	—16.92	—12.45	30
—13	—16.25	—4,354	—11.11	490.00	520.09	+30.09	+6.14	31
+5,624 <sup>1</sup> / <sub>2</sub>	+179.30	+224,817	+180.98	39.60	39.84	+0.24	+0.61	32
+2,485	+45.06	+27,065	+39.26	12.50	12.00	—0.50	—4.00	33
—1,079	—11.55	—16,110	—25.94	6.65	5.56	—1.09	—16.39	34
+5,023	+4.79	—128,522	—10.74	11.42	9.73	—1.69	—14.80	35
+10,419	+20.73	—37,190	—8.46	8.75	6.63	—2.12	—24.23	36
+149,398 <sup>1</sup> / <sub>2</sub>	+34.53	+126,730	+22.87	1.28	1.18	—0.10	—7.81	37
+8,437	+5.78	+172,722	+6.18	19.14	19.22	+0.08	+0.42	38
—23,627	—39.84	—221,828	—41.68	8.86	8.52	—0.34	—3.84	39
+393	+7.25	+9,374	+3.79	45.60	44.13	—1.47	—3.22	40
—1,616	—7.44	+8,719	+5.43	7.40	8.43	+1.03	+13.92	41
+3	+21.43	+65,400	+48.99	9,535.71	11,700.00	+2,164.29	+22.70	42
—633	—20.25	—3,582	—24.45	4.66	4.42	—0.24	—5.15	43

<sup>1</sup> No change in average price.

GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued. .

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Sheeting, cotton . . . .	100 pounds	50,626	\$1,328,603	52,277	\$1,289,402
2	Sheeting, cotton . . . .	100 yards	279,764	1,836,367	288,246	1,801,153
3	Shirting, . . . . .	100 pounds	32,566	975,848	42,619	1,241,725
4	Shirts, cotton . . . . .	dozen	273,078½	1,310,131	305,187½	1,355,528
5	Shirts, knit (infants'), . .	dozen	17,881	94,321	19,606	106,344
6	Shirts, woollen . . . . .	dozen	2,160	26,600	1,660	21,600
7	Shoddy, . . . . .	tons	1,787½	568,278	1,745½	535,633
Shoes:						
8	Boys', . . . . .	pairs	665,827	670,812	623,958	638,555
9	Children's, . . . . .	dozen pairs	207,856½	1,444,241	195,728½	1,404,900
10	Infants', . . . . .	dozen pairs	8,439½	24,787	8,843½	24,202
11	Men's, . . . . .	pairs	5,393,687	8,817,378	5,424,417	8,948,528
12	Misses', . . . . .	pairs	1,065,210	782,385	975,318	776,445
13	Plow (men's), . . . . .	pairs	113,584	86,600	99,124	74,517
14	Women's, . . . . .	pairs	2,597,369	2,275,002	2,345,972	2,180,165
15	Youths', . . . . .	pairs	442,713	397,641	434,577	373,907
16	Shoes, n. s.,* . . . . .	pairs	11,723,904	15,198,629	12,194,979	15,806,561
17	Shooks, box . . . . .	M feet	3,555	52,504	4,625	72,645
18	Skates, ice . . . . .	dozen pairs	24,224½	149,500	30,272½	191,929
19	Skirting, . . . . .	100 pounds	1,666	37,897	1,886	41,125
Slippers:						
20	Children's, . . . . .	dozen pairs	8,300	21,730	3,750	22,500
21	Men's, . . . . .	dozen pairs	19,707	214,854	20,382	220,075
22	Women's, . . . . .	dozen pairs	49,726	321,918	42,090½	288,417
23	Slippers, n. s.,* . . . . .	dozen pairs	138,266½	1,261,112	182,153½	1,258,671
24	Soap,* . . . . .	100 pounds	411,435	1,809,663	360,769	1,581,438
25	Soap, fulling . . . . .	100 pounds	36,380	167,178	40,146	180,396
26	Soap, soft . . . . .	barrels	15,381	43,157	15,324	43,208
27	Soles, . . . . .	100 pairs	167,314	1,632,436	167,211	1,548,007
28	Spice, ground . . . . .	100 pounds	14,508	218,514	13,644	194,800
29	Straw-board, . . . . .	100 pounds	4,041	8,330	6,550	12,012
30	Stiffenings, . . . . .	100 pairs	14,440	37,767	9,810	33,685
31	Stoves, parlor . . . . .	"	9,030	80,260	9,505	89,151
32	Suitings, woollen . . . . .	yards	351,666	590,774	370,015	580,666
33	Suitings, worsted . . . . .	yards	1,240,727	1,559,293	1,156,546	1,377,334
34	Suspenders, . . . . .	dozen	572,539	1,040,319	500,283	993,190
35	Tack-plate, . . . . .	tons	4,373	121,440	2,976	66,498
36	Tacks,* . . . . .	100 pounds	13,490	106,155	11,829	84,809
37	Tacks, iron . . . . .	100 pounds	2,992	21,692	2,965	21,496
38	Tacks, shoe . . . . .	100 pounds	1,482	18,087	1,604	19,505
39	Tallow, rendered . . . . .	100 pounds	103,863	475,364	88,691	421,904
40	Tents, . . . . .	"	108	2,220	122	2,325
41	Thread,* . . . . .	100 pounds	625	60,000	546	50,000
42	Thread, linen . . . . .	100 pounds	7,909	530,155	7,249	485,682

\* Not specified as to particular kind.

**GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.**  
**COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE**  
**— 1890, 1891 — Continued.**

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+1,651	+3.26	—\$39,201	—2.95	\$26.24	\$24.66	—\$1.58	—6.02	1
+8,482	+3.03	—35,214	—1.92	6.56	6.25	—0.31	—4.73	2
+10,053	+30.87	+266,377	+27.31	29.95	29.14	—0.81	—2.70	3
+32,059	+11.74	+75,395	+5.75	4.80	4.54	—0.26	—5.42	4
+1,725	+9.65	+12,023	+12.75	5.27	5.42	+0.15	+2.85	5
—500	—23.15	—5,000	—18.80	12.31	13.01	+0.70	+5.69	6
—42	—2.35	—32,645	—5.74	317.92	306.87	—11.05	—3.48	7
—41,869	—6.29	—32,257	—4.81	1.01	1.02	+0.01	+0.99	8
—12,128½	—5.83	—39,341	—2.72	6.95	7.18	+0.23	+3.31	9
—96½	—1.14	—585	—2.36	2.94	2.90	—0.04	—1.36	10
+30,730	+0.57	+131,150	+1.49	1.63	1.65	+0.02	+1.23	11
—89,892	—8.44	—5,940	—0.76	0.78	0.80	+0.07	+0.59	12
—14,460	—12.73	—12,173	—14.04	0.76	0.75	—0.01	—1.32	13
—251,397	—9.68	—114,837	—5.05	0.88	0.92	+0.04	+4.55	14
—8,136	—1.84	—23,734	—5.97	0.90	0.86	—0.04	—4.44	15
+471,075	+4.02	+607,932	+4.00	1.80	1.30	1=	1=	16
+1,070	+30.10	+20,141	+38.36	14.77	15.71	+0.94	+6.36	17
+6,048½	+24.97	+42,429	+28.38	6.17	6.34	+0.17	+2.76	18
—310	—18.23	+3,228	+8.52	22.34	29.67	+7.33	+32.81	19
+450	+13.64	+720	+3.31	6.60	6.00	—0.60	—9.09	20
+625	+3.17	+5,221	+2.43	10.90	10.82	—0.08	—0.73	21
—7,035½	—14.15	—33,501	—10.41	6.47	6.76	+0.29	+4.48	22
—1,113*	—0.84	—2,441	—0.19	9.46	9.52	+0.06	+0.63	23
—50,666	—12.31	—228,225	—12.61	4.40	4.38	—0.02	—0.45	24
+3,766	+10.35	+13,218	+7.91	4.60	4.49	—0.11	—2.39	25
—57	—0.37	+51	+0.12	2.81	2.82	+0.01	+0.36	26
—103	—0.06	—84,429	—5.17	9.76	9.26	—0.50	—5.12	27
—864	—5.96	—23,714	—10.85	15.06	14.28	—0.78	—5.18	28
+2,509	+62.09	+3,682	+44.20	2.06	1.83	—0.23	—11.17	29
—4,630	—32.06	—4,082	—10.81	2.62	3.43	+0.81	+30.92	30
+475	+5.26	+8,891	+11.08	8.89	9.38	+0.49	+5.51	31
+18,349	+5.22	—10,108	—1.71	1.68	1.57	—0.11	—6.55	32
—84,181	—6.78	—181,459	—11.64	1.26	1.19	—0.07	—5.56	33
—72,266	—12.62	—47,129	—4.53	1.82	1.99	+0.17	+9.34	34
—1,397	—31.95	—54,942	—45.24	27.77	22.34	—5.43	—19.55	35
—1,661	—12.31	—21,346	—20.11	7.87	7.17	—0.70	—8.89	36
—27	—0.90	—196	—0.90	7.25	7.25	1=	1=	37
+122	+8.23	+1,418	+7.84	12.20	12.16	—0.04	—0.33	38
—15,172	—14.61	—53,460	—11.25	4.58	4.76	+0.18	+3.93	39
+14	+12.96	+105	+4.73	20.56	19.06	—1.50	—7.30	40
—79	—12.64	—10,000	—16.67	96.00	91.58	—4.42	—4.60	41
—690	—8.34	—44,473	—8.89	67.03	67.00	—0.03	—0.04	42

\* No change in average price.

\* One-twelfth.

GOODS MADE: BY INDUSTRIES AND TOWNS — Continued.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Continued.

	ARTICLES.	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Thread, rubber . . . .	100 pounds	2,223	\$273,348	4,086	\$693,410
2	Ticking, . . . . .	100 yards	119,322	770,000	125,051	798,012
3	Ticking, . . . . .	100 pounds	15,324	419,156	15,349	419,310
4	Ties, Oxford (children's), . .	pairs	8,500	6,587	2,880	2,232
5	Ties, Oxford (misses'), . .	pairs	5,400	5,165	5,040	4,788
6	Ties, Oxford (women's), . .	pairs	94,270	121,383	72,716	102,629
7	Tips, boot and shoe . . . .	100 pairs	66,313	158,038	55,277	131,767
8	Tomatoes, canned . . . .	dozen	14,217	16,099	26,195	28,154
9	Twill, cotton . . . . .	100 yards	106,085	842,055	119,962	947,626
	Twine:					
10	Cotton, . . . . .	100 pounds	20,042	284,222	26,942	343,636
11	Flax, . . . . .	100 pounds	2,784	80,780	2,754	73,667
12	Hemp, . . . . .	100 pounds	357	9,644	243	5,832
13	Linen, . . . . .	100 pounds	35	4,550	33	4,125
14	Tow, . . . . .	100 pounds	4,628	73,151	7,375	119,438
15	Wool, . . . . .	100 pounds	2,841	14,207	5,500	27,501
16	Twist, machine . . . . .	100 pounds	756	562,215	902	603,481
17	Usters, . . . . .		4,500	42,000	6,000	57,000
18	Umbrellas, . . . . .		12,359	19,358	13,080	19,075
19	Vests, . . . . .		185,899	189,986	127,629	184,943
20	Vinegar, . . . . .	100 gallons	1,049	9,720	1,107	10,200
	Wagons:					
21	Bakers', . . . . .		18	4,680	22	5,720
22	Beach, . . . . .		20	7,000	26	9,495
23	Delivery, . . . . .		26	4,650	10	1,550
24	Democrat, . . . . .		168	11,451	221	15,952
25	Express, . . . . .		70	15,915	82	17,498
26	Milk, . . . . .		44	11,440	50	13,000
27	Refrigerator, . . . . .		27	6,425	31	5,875
28	Warp, cotton . . . . .	100 pounds	33,179	843,143	33,025	804,156
29	Washtubs, . . . . .	hundred	2,587	108,641	2,396	102,148
30	Waate, cotton . . . . .	100 pounds	171,785	789,767	221,273	952,558
	Web:					
31	Garter, . . . . .	gross	16,917	63,001	21,721	65,163
32	Goring (elastic), . . . .	100 yards	37,266	893,487	36,353	898,559
33	Loom, . . . . .	gross	34,233	128,732	27,156	108,361
34	Truss, . . . . .	100 yards	1,437	15,368	1,201	12,756
35	Weights, sash . . . . .	100 pounds	52,840	52,840	56,420	56,490
36	Wheels, carriage . . . .	sets	2,650	27,450	2,275	23,625
37	Wheels, wagon . . . . .	sets	1,425	17,250	1,635	20,250
38	Whip lashes, . . . . .	dozen	11,750	16,700	15,350	16,400

**GOODS MADE: BY INDUSTRIES AND TOWNS—Continued.**  
**COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE**  
**—1890, 1891—Continued.**

INCREASE (+), OR DECREASE (-), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (-), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (-), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+1,863	+83.81	+420,062	+153.67	\$122.96	\$100.70	+46.74	+38.01	1
+5,729	+4.80	+28,012	+3.64	6.45	6.38	-0.07	-1.09	2
+25	+0.16	+154	+0.04	27.35	27.32	-0.03	-0.11	3
-5,620	-66.12	-4,355	-66.12	0.77	0.78	+0.01	+1.30	4
-360	-6.67	-377	-7.30	0.96	0.95	-0.01	-1.04	5
-21,554	-22.86	-18,754	-15.45	1.29	1.41	+0.12	+0.30	6
-11,036	-16.64	-26,271	-16.62	2.88	2.88	<sup>1</sup> =	<sup>1</sup> =	7
+11,978	+84.25	+12,055	+74.88	1.13	1.07	-0.06	-5.31	8
+13,877	+13.06	+105,571	+12.54	7.94	7.90	-0.04	-0.50	9
+6,900	+34.43	+59,414	+20.90	14.18	12.75	-1.43	-10.08	10
-30	-1.06	-7,113	-8.81	29.02	26.75	-2.27	-7.82	11
-114	-31.93	-3,812	-39.53	27.01	24.00	-3.01	-11.14	12
-2	-5.71	-425	-9.34	130.00	125.00	-5.00	-3.85	13
+2,747	+59.36	+46,287	+63.28	15.81	16.19	+0.38	+2.40	14
+2,659	+93.59	+13,294	+93.57	5.00	5.00	<sup>1</sup> =	<sup>1</sup> =	15
+146	+19.31	+41,266	+7.34	743.67	669.05	-74.62	-10.03	16
+1,500	+33.33	+15,000	+35.71	9.33	9.50	+0.17	+1.82	17
+721	+5.83	-283	-1.46	1.57	1.46	-0.11	-7.01	18
-8,270	-6.09	-5,038	-2.65	1.40	1.45	+0.05	+3.57	19
+58	+5.53	+480	+4.94	9.27	9.21	-0.06	-0.65	20
+4	+22.22	+1,040	+22.22	260.00	260.00	<sup>1</sup> =	<sup>1</sup> =	21
+6	+30.00	+2,495	+35.67	350.00	365.19	+15.19	+4.34	22
-16	-61.54	-3,100	-66.67	178.85	155.00	-23.85	-13.33	23
+53	+31.55	+4,501	+39.31	68.16	72.18	+4.02	+5.90	24
+12	+17.14	+1,583	+9.95	227.36	213.39	-13.97	-6.14	25
+6	+13.64	+1,560	+13.64	260.00	260.00	<sup>1</sup> =	<sup>1</sup> =	26
+4	+14.81	-550	-8.56	237.96	189.52	-48.44	-20.36	27
-154	-0.46	-38,987	-4.62	25.41	24.35	-1.06	-4.17	28
-191	-7.38	-6,493	-5.98	41.99	42.63	+0.64	+1.52	29
+49,488	+28.81	+162,791	+20.61	4.60	4.30	-0.30	-6.52	30
+4,804	+28.40	+2,162	+3.43	8.72	8.00	-0.72	-19.35	31
-408	-1.09	+5,072	+0.57	23.98	24.38	+0.40	+1.67	32
-7,077	-20.67	-20,371	-15.82	8.76	3.99	+0.23	+6.12	33
-236	-16.42	-2,612	-17.00	10.69	10.62	-0.07	-0.65	34
+3,580	+6.78	+3,650	+6.91	1.00	1.00	<sup>1</sup> =	<sup>1</sup> =	35
-375	-14.15	-3,825	-13.93	10.36	10.38	+0.02	+0.19	36
+200	+14.04	+3,000	+17.39	12.11	12.46	+0.35	+2.89	37
+3,600	+30.64	-300	-1.80	1.42	1.07	-0.35	-24.65	38

<sup>1</sup> No change in average price.



**GOODS MADE: BY INDUSTRIES AND TOWNS — Concluded.**  
**COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE**  
**— 1890, 1891 — Concluded.**

	ARTICLES	Basis	1890		1891	
			Quantity	Value	Quantity	Value
1	Whips, . . . . .	dozen	186,132	\$616,196	257,600	\$692,250
2	Wire, iron . . . . .	100 pounds	60,840	339,742	69,980	336,197
	Yarn:					
3	Carpet, . . . . .	100 pounds	3,789	111,653	4,695	148,290
4	Carpet (worsted), . . .	100 pounds	25,322	1,007,416	26,602	1,193,994
5	Cotton, . . . . .	100 pounds	259,884	6,331,712	294,865	7,146,360
6	Hosiery, . . . . .	100 pounds	86,732	762,978	48,985	990,883
7	Tow, . . . . .	100 pounds	12,881	199,668	14,580	225,997
8	Woollen, . . . . .	100 pounds	7,636	338,840	12,854	451,769
9	Worsted, . . . . .	100 pounds	56,993	3,641,099	68,727	4,381,944

GOODS MADE: BY INDUSTRIES AND TOWNS — Concluded.  
COMPARISON OF QUANTITIES AND VALUES OF GOODS MADE  
— 1890, 1891 — Concluded.

INCREASE (+), OR DECREASE (—), IN QUANTITY IN 1891 AS COMPARED WITH 1890		INCREASE (+), OR DECREASE (—), IN VALUE IN 1891 AS COMPARED WITH 1890		AVERAGE VALUE PER BASIS		INCREASE (+), OR DECREASE (—), IN AVERAGE PRICE PER BASIS IN 1891		
Quantity	Percentages	Amounts	Percentages	1890	1891	Amounts	Percentages	
+71,468	+38.40	+876,054	+12.34	\$3.31	\$2.09	—\$0.62	—18.73	1
+9,140	+15.02	—3,545	—1.04	5.58	4.80	—0.78	—13.98	2
+906	+23.91	+36,646	+32.82	29.47	31.59	+2.12	+7.19	3
+1,280	+5.05	+186,578	+18.52	39.78	44.88	+5.10	+12.82	4
+34,981	+18.46	+814,648	+12.87	24.36	24.24	—0.12	—0.49	5
+12,253	+33.36	+227,910	+29.87	20.77	20.23	—0.54	—2.60	6
+1,699	+18.19	+26,334	+13.19	15.50	15.50	<sup>1</sup> =	<sup>1</sup> =	7
+5,218	+68.33	+117,929	+35.33	43.72	35.15	—8.57	—19.00	8
+11,734	+20.59	+740,845	+20.35	63.89	63.76	—0.13	—0.20	9

<sup>1</sup> No change in average price.



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## PERSONS EMPLOYED: BY INDUSTRIES.

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## SMALLEST, GREATEST, AND AVERAGE NUMBER OF PERSONS EMPLOYED: BY INDUSTRIES.

[In this table, by the terms "Periods of employment of smallest number" and "Periods of employment of greatest number" are meant those times, *as regards aggregate number of persons employed*, when the smallest or greatest number, respectively, was employed.]

### AGGREGATES — 1890.

INDUSTRIES.	Number of Estab- lishments Con- sidered	Aggregate Average Number of Persons Employed	AGGREGATES OF PERSONS EMPLOYED AT PERIODS OF EMPLOYMENT OF —		Excess of Greatest over Smallest Number
			Smallest Number	Greatest Number	
Agricultural implements, . . . . .	11	691	636	763	117
Arms and ammunition, . . . . .	12	1,852	1,727	1,987	260
Artisans' tools, . . . . .	56	1,676	1,520	1,821	301
Awnings, sails, tents, etc., . . . . .	30	155	103	224	121
Boots and shoes, . . . . .	567	44,068	35,314	51,234	15,920
Boxes (paper and wooden), . . . . .	141	3,228	2,815	3,677	862
Brick, tiles, and sewer pipe, . . . . .	45	1,170	570	1,947	1,377
Brooms, brushes, and mops, . . . . .	21	762	707	824	117
Burial cases, caskets, coffins, etc., . . . . .	6	209	204	215	11
Buttons and dress trimmings, . . . . .	17	1,070	867	1,332	465
Carpetings, . . . . .	12	4,635	4,426	4,780	354
Carriages and wagons, . . . . .	96	2,244	1,867	2,672	805
Cement, kaolin, lime, and plaster, . . . . .	4	68	53	87	34
Chemical preparations (compounded), . . . . .	9	267	256	282	26
Clocks, watches, and jewelry, . . . . .	77	3,422	2,792	3,634	1,042
Clothing, . . . . .	113	8,178	6,732	9,404	2,672
Cooking, lighting, and heating apparatus, . . . . .	31	2,094	1,624	2,318	694
Cordage and twine, . . . . .	25	3,260	2,719	3,889	1,170
Corks, bungs, and taps, . . . . .	4	45	39	49	10
Cotton goods, . . . . .	157	70,596	67,862	73,323	5,461
Cotton, woollen, and other textiles, . . . . .	3	2,134	1,941	2,253	312
Crayons, pencils, crucibles, etc., . . . . .	4	49	48	50	2
Drugs and medicines, . . . . .	19	377	322	430	108
Dyestuffs, . . . . .	7	217	194	229	35
Earthen, plaster, and stone ware, . . . . .	4	222	203	234	31
Electrical apparatus and appliances, . . . . .	5	2,595	2,374	2,916	542
Electroplating, . . . . .	10	77	68	89	21
Emery and sand paper and cloth, etc., . . . . .	13	280	234	322	88
Fancy articles, . . . . .	6	244	215	281	66
Fertilizers, . . . . .	7	62	50	101	51
Fine arts and taxidermy, . . . . .	2	7	5	8	3

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## SMALLEST, GREATEST, AND AVERAGE NUMBER OF PERSONS EMPLOYED. AGGREGATES—1890—Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	Aggregate Average Number of Persons Employed	AGGREGATES OF PERSONS EMPLOYED AT PERIODS OF EMPLOYMENT OF—		Excess of Greatest over Smallest Number
			Smallest Number	Greatest Number	
Fireworks and matches, . . . . .	3	52	23	81	58
Flax, hemp, jute, and linen goods, . . .	8	1,875	1,644	2,054	410
Food preparations, . . . . .	264	6,434	4,717	8,401	3,684
Furniture, . . . . .	120	4,871	4,328	5,413	1,085
Glass, . . . . .	10	458	364	495	131
Glue, isinglass, and starch, . . . . .	14	386	315	581	266
Hair work (animal and human), . . . .	10	213	185	251	66
Hose: rubber, linen, etc., . . . . .	5	175	141	210	69
Hosiery and knit goods, . . . . .	40	4,077	3,308	5,051	1,743
Ink, mucilage, and paste, . . . . .	8	115	112	118	6
Ivory, bone, shell, and horn goods, etc., .	18	461	413	535	122
Leather, . . . . .	154	6,137	4,493	7,421	2,928
Liquors and beverages (not spirituous), .	12	115	90	158	68
Liquors: malt, distilled, and fermented, .	49	928	851	1,087	236
Lumber, . . . . .	25	751	598	875	277
Machines and machinery, . . . . .	263	15,709	13,833	17,743	3,910
Metals and metallic goods, . . . . .	277	17,096	15,268	18,718	3,450
Mixed textiles, . . . . .	13	833	758	930	172
Models and patterns, . . . . .	5	41	36	48	12
Musical instruments and materials, . . .	46	2,889	2,674	3,096	422
Oils and illuminating fluids, . . . . .	9	173	131	222	91
Paints, colors, and crude chemicals, . .	16	242	219	264	45
Paper and paper goods, . . . . .	102	9,574	8,958	10,162	1,204
Perfumes, toilet articles, etc., . . . .	4	35	34	37	3
Photographs and photographic materials, .	11	162	131	165	34
Polishes and dressing, . . . . .	18	229	185	258	73
Printing, publishing, and bookbinding, .	24	1,755	1,596	1,948	352
Print works, dye works, and bleacheries, .	37	5,521	5,054	5,944	890
Railroad construction and equipment, . .	14	2,751	2,401	3,055	654
Rubber and elastic goods, . . . . .	30	7,615	6,297	8,817	2,520
Scientific instruments and appliances, . .	11	893	817	967	150
Shipbuilding, . . . . .	42	680	438	994	556
Silk and silk goods, . . . . .	9	2,268	1,986	2,504	518
Sporting and athletic goods, . . . . .	9	323	250	404	154
Stone, . . . . .	111	3,434	2,468	4,252	1,784
Straw and palm leaf goods, . . . . .	17	2,073	567	3,451	2,884
Tallow, candles, soap, and grease, . . .	55	688	605	774	169
Tobacco, snuff, and cigars, . . . . .	35	1,275	985	1,571	586
Toys and games (children's), . . . . .	8	457	331	577	246
Trunks and valises, . . . . .	7	107	71	123	52
Whips, lashes, and stocks, . . . . .	15	418	380	459	79
Wooden goods, . . . . .	149	2,888	2,166	3,296	1,130
Woollen goods, . . . . .	138	16,816	15,054	18,426	3,372
Worsted goods, . . . . .	21	7,963	7,345	8,787	1,442
ALL INDUSTRIES, . . . . .	3,745	287,900	251,107	322,288	71,181

## SMALLEST, GREATEST, AND AVERAGE NUMBER OF PERSONS EMPLOYED: BY INDUSTRIES.

[In this table, by the terms "Periods of employment of smallest number" and "Periods of employment of greatest number" are meant those times, *as regards aggregate number of persons employed*, when the smallest or greatest number, respectively, was employed.]

### AGGREGATES — 1891.

INDUSTRIES	Number of Estab- lishments Con- sidered	Aggregate Average Number of Persons Employed	AGGREGATES OF PERSONS EMPLOYED AT PERIODS OF EMPLOYMENT OF —		Excess of Greatest over Smallest Number
			Smallest Number	Greatest Number	
Agricultural implements, . . . . .	11	677	591	742	151
Arms and ammunition, . . . . .	12	2,096	1,864	2,283	419
Artisans' tools, . . . . .	56	1,685	1,514	1,807	293
Awnings, sails, tents, etc., . . . . .	30	149	104	233	129
Boots and shoes, . . . . .	567	43,343	36,201	51,550	15,349
Boxes (paper and wooden), . . . . .	141	3,170	2,712	3,667	955
Brick, tiles, and sewer pipe, . . . . .	45	1,214	547	2,015	1,468
Brooms, brushes, and mops, . . . . .	21	790	734	850	116
Burial cases, caskets, coffins, etc., . . . . .	6	222	216	224	8
Buttons and dress trimmings, . . . . .	17	1,197	1,007	1,398	391
Carpetings, . . . . .	12	4,872	4,345	4,865	520
Carriages and wagons, . . . . .	96	2,299	1,760	2,878	1,118
Cement, kaolin, lime, and plaster, . . . . .	4	58	46	83	37
Chemical preparations (compounded), . . . . .	9	279	251	305	54
Clocks, watches, and jewelry, . . . . .	77	3,394	2,867	3,912	1,045
Clothing, . . . . .	113	8,097	6,651	9,454	2,803
Cooking, lighting, and heating apparatus, . . . . .	31	2,227	1,760	2,529	769
Cordage and twine, . . . . .	25	3,595	2,854	4,316	1,462
Corks, bungs, and taps, . . . . .	4	42	36	50	14
Cotton goods, . . . . .	167	71,960	69,189	75,003	5,814
Cotton, woollen, and other textiles, . . . . .	3	2,299	2,165	2,412	247
Crayons, pencils, crucibles, etc., . . . . .	4	43	38	46	8
Drugs and medicines, . . . . .	19	432	338	513	175
Dyestuffs, . . . . .	7	218	187	240	53
Earthen, plaster, and stone ware, . . . . .	4	216	121	269	148
Electrical apparatus and appliances, . . . . .	5	2,660	2,197	3,249	1,052
Electroplating, . . . . .	10	79	68	91	23
Emery and sand paper and cloth, etc., . . . . .	13	336	285	379	94
Fancy articles, . . . . .	6	219	203	248	45
Fertilizers, . . . . .	7	53	40	95	55
Fine arts and taxidermy, . . . . .	2	7	4	11	7

## PERSONS EMPLOYED: BY INDUSTRIES — Continued.

## SMALLEST, GREATEST, AND AVERAGE NUMBER OF PERSONS EMPLOYED. AGGREGATES — 1891 — Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	Aggregate Average Number of Persons Employed	AGGREGATES OF PERSONS EMPLOYED AT PERIODS OF EMPLOYMENT OF —		Excess of Greatest over Smallest Number
			Smallest Number	Greatest Number	
Fireworks and matches, . . . . .	3	71	46	93	47
Flax, hemp, jute, and linen goods, . . . . .	8	1,897	1,843	1,953	110
Food preparations, . . . . .	264	7,082	5,524	9,168	3,644
Furniture, . . . . .	120	4,994	4,508	5,452	944
Glass, . . . . .	10	488	463	537	74
Glue, isinglass, and starch, . . . . .	14	899	882	935	153
Hair work (animal and human), . . . . .	10	205	181	221	40
Hose: rubber, linen, etc., . . . . .	5	233	198	276	78
Hosiery and knit goods, . . . . .	40	5,130	4,276	5,769	1,493
Ink, mucilage, and paste, . . . . .	8	115	113	119	6
Ivory, bone, shell, and horn goods, etc., . . . . .	13	504	419	563	144
Leather, . . . . .	154	5,512	4,401	6,768	2,367
Liquors and beverages (not spirituous), . . . . .	12	126	96	167	71
Liquors: malt, distilled, and fermented, . . . . .	49	1,009	893	1,194	301
Lumber, . . . . .	25	753	546	969	423
Machines and machinery, . . . . .	263	16,120	14,101	18,033	3,932
Metals and metallic goods, . . . . .	277	17,373	15,461	19,398	3,937
Mixed textiles, . . . . .	13	797	748	905	157
Models and patterns, . . . . .	5	42	36	47	11
Musical instruments and materials, . . . . .	46	2,602	2,544	2,898	354
Oils and illuminating fluids, . . . . .	9	181	141	244	103
Paints, colors, and crude chemicals, . . . . .	16	240	203	257	54
Paper and paper goods, . . . . .	102	9,873	9,813	10,528	1,215
Perfumes, toilet articles, etc., . . . . .	4	36	33	40	7
Photographs and photographic materials, . . . . .	11	141	119	155	36
Pollishes and dressing, . . . . .	18	218	182	260	78
Printing, publishing, and bookbinding, . . . . .	24	1,796	1,605	2,006	400
Print works, dye works, and bleacheries, . . . . .	37	5,240	5,243	6,071	828
Railroad construction and equipment, . . . . .	14	2,709	2,321	3,121	800
Rubber and elastic goods, . . . . .	30	7,857	7,209	9,056	1,787
Scientific instruments and appliances, . . . . .	11	991	928	1,068	140
Shipbuilding, . . . . .	42	679	383	1,072	689
Silk and silk goods, . . . . .	9	2,232	2,079	2,332	253
Sporting and athletic goods, . . . . .	9	367	259	497	238
Stone, . . . . .	111	3,435	2,328	4,443	2,115
Straw and palm leaf goods, . . . . .	17	2,094	464	3,506	3,042
Tallow, candles, soap, and grease, . . . . .	55	635	609	640	31
Tobacco, snuff, and cigars, . . . . .	35	1,388	1,114	1,639	525
Toys and games (children's), . . . . .	8	498	320	663	343
Trunks and valises, . . . . .	7	111	76	126	50
Whips, lashes, and stocks, . . . . .	15	419	381	457	76
Wooden goods, . . . . .	149	3,012	2,341	3,391	1,050
Woollen goods, . . . . .	138	17,479	16,007	18,321	2,314
Worsted goods, . . . . .	21	7,965	7,379	8,460	1,081
ALL INDUSTRIES, . . . . .	3,745	292,866	258,771	329,634	70,863



## SMALLEST, GREATEST, AND AVERAGE NUMBER OF PERSONS EMPLOYED: BY INDUSTRIES.

[In this table, averages for each establishment are given. These have been arrived at by dividing the aggregates given in the table on pages 90 and 91 by the number of establishments.]

### AVERAGES — 1890.

INDUSTRIES.	Number of Establishments Considered	AVERAGES			
		NUMBER OF PERSONS EMPLOYED IN EACH ESTABLISHMENT			
		Average Number	Smallest Number	Greatest Number	Excess of Greatest over Smallest Number
Agricultural implements, . . . .	11	63	58	68	10
Arms and ammunition, . . . .	12	154	144	166	22
Artisans' tools, . . . .	56	30	27	33	6
Awnings, sails, tents, etc., . . .	30	5	3	7	4
Boots and shoes, . . . .	567	78	62	90	28
Boxes (paper and wooden), . . . .	141	23	20	26	6
Brick, tiles, and sewer pipe, . . .	45	26	13	43	30
Brooms, brushes, and mops, . . .	21	36	34	39	5
Burial cases, caskets, coffins, etc., . .	6	35	34	36	2
Buttons and dress trimmings, . . .	17	63	51	78	27
Carpets, . . . .	12	386	369	398	29
Carriages and wagons, . . . .	96	23	19	28	9
Cement, kaolin, lime, and plaster, . .	4	17	13	22	9
Chemical preparations (compounded), .	9	30	28	31	3
Clocks, watches, and jewelry, . . .	77	44	36	50	14
Clothing, . . . .	113	72	60	83	23
Cooking, lighting, and heating apparatus,	31	68	52	75	23
Cordage and twine, . . . .	25	130	109	156	47
Corks, bungs, and taps, . . . .	4	11	10	12	2
Cotton goods, . . . .	167	450	432	467	35
Cotton, woollen, and other textiles, .	3	711	647	751	104
Crayons, pencils, crucibles, etc., . .	4	12	12	13	1
Drugs and medicines, . . . .	19	20	17	23	6
Dyestuffs, . . . .	7	31	28	33	5
Earthen, plaster, and stone ware, . .	4	56	51	59	8
Electrical apparatus and appliances, .	5	519	475	583	108
Electroplating, . . . .	10	8	7	9	2
Emery and sand paper and cloth, etc., .	13	22	18	25	7
Fancy articles, . . . .	6	41	36	47	11
Fertilizers, . . . .	7	9	7	14	7
Fine arts and taxidermy, . . . .	2	4	3	4	1
Fireworks and matches, . . . .	3	17	8	27	19

## PERSONS EMPLOYED: BY INDUSTRIES — Continued.

## SMALLEST, GREATEST, AND AVERAGE NUMBER OF PERSONS EMPLOYED. AVERAGES — 1890 — Concluded.

INDUSTRIES.	Number of Establishments Considered	AVERAGES			
		NUMBER OF PERSONS EMPLOYED IN EACH ESTABLISHMENT			
		Average Number	Smallest Number	Greatest Number	Excess of Greatest over Smallest Number
Flax, hemp, jute, and linen goods, . . .	8	234	206	257	51
Food preparations, . . . . .	284	24	13	32	14
Furniture, . . . . .	120	41	36	45	9
Glass, . . . . .	10	46	36	50	14
Glue, isinglass, and starch, . . . .	14	28	23	42	19
Hair work (animal and human), . . .	10	21	19	25	6
Hose: rubber, linen, etc., . . . . .	5	35	28	42	14
Hosiery and knit goods, . . . . .	40	102	83	126	43
Ink, mucilage, and paste, . . . . .	8	14	14	15	1
Ivory, bone, shell, and horn goods, etc., .	18	35	32	41	9
Leather, . . . . .	154	40	29	48	19
Liquors and beverages (not spirituous), .	12	10	8	13	5
Liquors: malt, distilled, and fermented, .	49	19	17	22	5
Lumber, . . . . .	25	30	24	35	11
Machines and machinery, . . . . .	263	60	53	67	14
Metals and metallic goods, . . . . .	277	62	55	68	13
Mixed textiles, . . . . .	13	64	58	72	14
Models and patterns, . . . . .	5	8	7	10	3
Musical instruments and materials, . . .	46	63	58	67	9
Oils and illuminating fluids, . . . . .	9	19	15	25	10
Paints, colors, and crude chemicals, . .	16	15	14	17	3
Paper and paper goods, . . . . .	102	94	88	100	12
Perfumes, toilet articles, etc., . . . .	4	9	9	9	-
Photographs and photographic materials, .	11	14	12	15	3
Polishes and dressing, . . . . .	18	13	10	14	4
Printing, publishing, and bookbinding, .	24	73	67	81	14
Print works, dye works, and bleacheries, .	37	149	137	161	24
Railroad construction and equipment, . .	14	197	172	218	46
Rubber and elastic goods, . . . . .	30	254	210	294	84
Scientific instruments and appliances, . .	11	81	74	88	14
Shipbuilding, . . . . .	42	16	10	24	14
Silk and silk goods, . . . . .	9	252	221	278	57
Sporting and athletic goods, . . . . .	9	36	28	45	17
Stone, . . . . .	111	31	22	38	16
Straw and palm leaf goods, . . . . .	17	122	33	203	170
Tallow, candles, soap, and grease, . . .	55	13	11	14	3
Tobacco, snuff, and cigars, . . . . .	35	36	28	45	17
Toys and games (children's), . . . . .	8	57	41	72	31
Trunks and valises, . . . . .	7	15	10	18	8
Whips, lashes, and stocks, . . . . .	15	28	25	31	6
Wooden goods, . . . . .	149	19	15	22	7
Woollen goods, . . . . .	138	122	109	134	25
Worsted goods, . . . . .	21	379	350	418	68
ALL INDUSTRIES, . . . . .	3,745	77	67	86	19

## SMALLEST, GREATEST, AND AVERAGE NUMBER OF PERSONS EMPLOYED: BY INDUSTRIES.

[In this table, averages for each establishment are given. These have been arrived at by dividing the aggregates given in the table on pages 92 and 93 by the number of establishments.]

### AVERAGES — 1891.

INDUSTRIES.	Number of Establishments Considered	AVERAGES			
		NUMBER OF PERSONS EMPLOYED IN EACH ESTABLISHMENT			
		Average Number	Smallest Number	Greatest Number	Excess of Greatest over Smallest Number
Agricultural implements, . . . . .	11	62	54	67	13
Arms and ammunition, . . . . .	12	175	155	190	35
Artisans' tools, . . . . .	56	80	27	82	5
Awnings, sails, tents, etc., . . . . .	30	5	3	8	5
Boots and shoes, . . . . .	567	76	64	91	27
Boxes (paper and wooden), . . . . .	141	22	19	26	7
Brick, tiles, and sewer pipe, . . . . .	45	27	12	45	33
Brooms, brushes, and mops, . . . . .	21	38	35	40	5
Burial cases, caskets, coffins, etc., . . . . .	6	37	36	37	1
Buttons and dress trimmings, . . . . .	17	70	59	82	23
Carpetings, . . . . .	12	389	362	405	43
Carriages and wagons, . . . . .	96	24	18	30	12
Cement, kaolin, lime, and plaster, . . . . .	4	15	12	21	9
Chemical preparations (compounded), . . . . .	9	31	28	34	6
Clocks, watches, and jewelry, . . . . .	77	44	37	51	14
Clothing, . . . . .	118	72	59	94	35
Cooking, lighting, and heating apparatus, . . . . .	31	72	57	82	25
Cordage and twine, . . . . .	25	144	114	173	59
Corks, bungs, and taps, . . . . .	4	11	9	13	4
Cotton goods, . . . . .	157	458	441	478	37
Cotton, woollen, and other textiles, . . . . .	3	766	722	804	82
Crayons, pencils, crucibles, etc., . . . . .	4	11	10	12	2
Drugs and medicines, . . . . .	19	23	18	27	9
Dyestuffs, . . . . .	7	31	27	34	7
Earthen, plaster, and stone ware, . . . . .	4	54	30	67	37
Electrical apparatus and appliances, . . . . .	5	532	439	650	211
Electroplating, . . . . .	10	8	7	9	2
Emery and sand paper and cloth, etc., . . . . .	13	26	22	29	7
Fancy articles, . . . . .	6	37	34	41	7
Fertilizers, . . . . .	7	8	6	14	8
Fine arts and taxidermy, . . . . .	2	4	2	6	4
Fireworks and matches, . . . . .	3	24	15	31	16

## PERSONS EMPLOYED: BY INDUSTRIES — Continued.

SMALLEST, GREATEST, AND AVERAGE NUMBER OF PERSONS  
EMPLOYED. AVERAGES — 1891 — Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGES			
		NUMBER OF PERSONS EMPLOYED IN EACH ESTABLISHMENT			
		Average Number	Smallest Number	Greatest Number	Excess of Greatest over Smallest Number
Flax, hemp, jute, and linen goods, . . .	8	237	230	244	14
Food preparations, . . . . .	264	27	21	35	14
Furniture, . . . . .	120	42	38	45	7
Glass, . . . . .	10	49	46	54	8
Glue, isinglass, and starch, . . . .	14	29	27	38	11
Hair work (animal and human), . . .	10	21	18	22	4
Hose: rubber, linen, etc., . . . .	5	47	40	55	15
Hosiery and knit goods, . . . . .	40	128	107	144	37
Ink, mucilage, and paste, . . . . .	8	14	14	15	1
Ivory, bone, shell, and horn goods, etc., .	13	39	32	43	11
Leather, . . . . .	154	36	29	44	15
Liquors and beverages (not spirituous), .	12	11	8	14	6
Liquors: malt, distilled, and fermented, .	49	21	18	24	6
Lumber, . . . . .	25	30	22	39	17
Machines and machinery, . . . . .	263	61	54	69	15
Metals and metallic goods, . . . . .	277	63	56	70	14
Mixed textiles, . . . . .	13	61	58	70	12
Models and patterns, . . . . .	5	8	7	9	2
Musical instruments and materials, . .	46	59	55	63	8
Oils and illuminating fluids, . . . .	9	20	16	27	11
Paints, colors, and crude chemicals, . .	16	15	13	18	3
Paper and paper goods, . . . . .	102	97	91	103	12
Perfumes, toilet articles, etc., . . . .	4	9	8	10	2
Photographs and photographic materials,	11	13	11	14	3
Polishes and dressing, . . . . .	18	12	10	14	4
Printing, publishing, and bookbinding, .	24	75	67	84	17
Print works, dye works, and bleacheries,	37	142	142	164	22
Railroad construction and equipment, .	14	194	166	223	57
Rubber and elastic goods, . . . . .	30	262	242	302	60
Scientific instruments and appliances, .	11	90	84	97	13
Shipbuilding, . . . . .	42	16	9	26	17
Silk and silk goods, . . . . .	9	248	231	259	28
Sporting and athletic goods, . . . . .	9	41	29	55	26
Stone, . . . . .	111	31	21	40	19
Straw and palm leaf goods, . . . . .	17	123	27	206	179
Tallow, candles, soap, and grease, . .	55	12	11	12	1
Tobacco, snuff, and cigars, . . . . .	35	40	32	47	15
Toys and games (children's), . . . . .	8	62	40	83	43
Trunks and valises, . . . . .	7	16	11	15	7
Whips, lashes, and stocks, . . . . .	15	28	25	30	5
Wooden goods, . . . . .	149	20	16	23	7
Woollen goods, . . . . .	138	127	116	136	20
Worsted goods, . . . . .	21	379	351	403	52
ALL INDUSTRIES, . . . . .	3,745	78	69	88	19

## COMPARISON OF RANGE OF EMPLOY- MENT: BY INDUSTRIES.

1890, 1891.

[In this presentation, the excess of greatest over smallest number of persons employed for 1890 and 1891 is brought forward from the tables on pages 90 to 93, inclusive, and a comparison is made between the two years. The relative increase or decrease in the excess of greatest number over smallest number of persons employed in 1891 as compared with 1890 is given with its equivalent percentage.]

INDUSTRIES.	Number of Estab- lishments Con- sidered	EXCESS OF GREATEST OVER SMALLEST NUMBER OF PERSONS EMPLOYED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Number	Percent- ages
Agricultural implements, . . . . .	11	117	151	+34	+29.06
Arms and ammunition, . . . . .	12	260	419	+159	+61.15
Artisans' tools, . . . . .	56	301	293	-8	-2.66
Awnings, sails, tents, etc., . . . . .	30	121	129	+8	+6.61
Boots and shoes, . . . . .	567	15,920	15,349	-571	-3.59
Boxes (paper and wooden), . . . . .	141	862	955	+93	+10.79
Brick, tiles, and sewer pipe, . . . . .	45	1,377	1,468	+91	+6.61
Brooms, brushes, and mops, . . . . .	21	117	118	-1	-0.85
Burial cases, caskets, coffins, etc., . . . . .	6	11	8	-3	-27.27
Buttons and dress trimmings, . . . . .	17	465	391	-74	-15.91
Carpetings, . . . . .	12	354	520	+166	+46.89
Carriages and wagons, . . . . .	96	805	1,118	+313	+38.88
Cement, kaolin, lime, and plaster, . . . . .	4	34	37	+3	+8.82
Chemical preparations (compounded), . . . . .	9	26	54	+28	+107.69
Clocks, watches, and jewelry, . . . . .	77	1,042	1,045	+3	+0.29
Clothing, . . . . .	113	2,672	2,803	+131	+4.90
Cooking, lighting, and heating apparatus, . . . . .	31	694	769	+75	+10.81
Cordage and twine, . . . . .	25	1,170	1,462	+292	+24.96
Corks, bungs, and taps, . . . . .	4	10	14	+4	+40.00
Cotton goods, . . . . .	157	5,461	5,814	+353	+6.46
Cotton, woollen, and other textiles, . . . . .	3	312	247	-65	-20.83
Crayons, pencils, crucibles, etc., . . . . .	4	2	8	+6	+300.00
Drugs and medicines, . . . . .	19	108	175	+67	+62.04
Dyestuffs, . . . . .	7	35	58	+18	+51.43
Earthen, plaster, and stone ware, . . . . .	4	31	148	+117	+377.42
Electrical apparatus and appliances, . . . . .	5	542	1,052	+510	+94.10
Electroplating, . . . . .	10	21	23	+2	+9.52
Emery and sand paper and cloth, etc., . . . . .	13	88	94	+6	+6.82
Fancy articles, . . . . .	6	66	45	-21	-31.82
Fertilizers, . . . . .	7	51	55	+4	+7.84
Fine arts and taxidermy, . . . . .	2	3	7	+4	+133.33
Fireworks and matches, . . . . .	3	58	47	-11	-18.97
Flax, hemp, jute, and linen goods, . . . . .	8	410	110	-300	-73.17
Food preparations, . . . . .	264	3,684	3,644	-40	-1.09

## PERSONS EMPLOYED: BY INDUSTRIES — Continued.

COMPARISON OF RANGE OF EMPLOYMENT: BY INDUSTRIES  
— 1890, 1891 — Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	EXCESS OF GREATEST OVER SMALLEST NUMBER OF PERSONS EMPLOYED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Number	Percent- ages
Furniture, . . . . .	120	1,085	944	-141	-13.00
Glass, . . . . .	10	131	74	-57	-43.51
Glue, isinglass, and starch, . . . . .	14	266	153	-113	-42.48
Hair work (animal and human), . . . . .	10	66	40	-26	-39.39
Hose: rubber, linen, etc., . . . . .	5	69	78	+9	+13.04
Hosiery and knit goods, . . . . .	40	1,743	1,493	-250	-14.34
Ink, mucilage, and paste, . . . . .	8	6	6	=	=
Ivory, bone, shell, and horn goods, etc., . . . . .	13	122	144	+22	+18.03
Leather, . . . . .	154	2,928	2,367	-561	-19.16
Liquors and beverages (not spirituous), . . . . .	12	68	71	+3	+4.41
Liquors: malt, distilled, and fermented, . . . . .	49	236	301	+65	+27.54
Lumber, . . . . .	25	277	423	+146	+52.71
Machines and machinery, . . . . .	263	3,910	3,932	+22	+0.56
Metals and metallic goods, . . . . .	277	3,450	3,937	+487	+14.12
Mixed textiles, . . . . .	13	172	157	-15	-8.72
Models and patterns, . . . . .	5	12	11	-1	-8.33
Musical instruments and materials, . . . . .	46	422	354	-68	-16.11
Oils and illuminating fluids, . . . . .	9	91	103	+12	+13.19
Paints, colors, and crude chemicals, . . . . .	16	45	54	+9	+20.00
Paper and paper goods, . . . . .	102	1,204	1,215	+11	+0.91
Perfumes, toilet articles, etc., . . . . .	4	3	7	+4	+133.33
Photographs and photographic materials, . . . . .	11	34	36	+2	+5.88
Polishes and dressing, . . . . .	18	73	78	+5	+6.85
Printing, publishing, and bookbinding, . . . . .	24	352	400	+48	+13.64
Print works, dye works, and bleacheries, . . . . .	37	890	828	-62	-6.97
Railroad construction and equipment, . . . . .	14	654	800	+146	+22.32
Rubber and elastic goods, . . . . .	30	2,520	1,787	-733	-29.09
Scientific instruments and appliances, . . . . .	11	150	140	-10	-6.67
Shipbuilding, . . . . .	42	556	689	+133	+23.92
Silk and silk goods, . . . . .	9	518	253	-265	-51.16
Sporting and athletic goods, . . . . .	9	154	238	+84	+54.55
Stone, . . . . .	111	1,784	2,115	+331	+18.55
Straw and palm leaf goods, . . . . .	17	2,884	3,042	+158	+5.48
Tallow, candles, soap, and grease, . . . . .	55	169	31	-138	-81.66
Tobacco, snuff, and cigars, . . . . .	35	586	525	-61	-10.41
Toys and games (children's), . . . . .	8	246	343	+97	+39.43
Trunks and valises, . . . . .	7	52	50	-2	-3.85
Whips, lashes, and stocks, . . . . .	15	79	76	-3	-3.80
Wooden goods, . . . . .	149	1,130	1,050	-80	-7.09
Woollen goods, . . . . .	138	3,372	2,814	-558	-16.55
Worsted goods, . . . . .	21	1,442	1,081	-361	-25.03
ALL INDUSTRIES, . . . . .	3,745	71,181	70,863	-318	-0.45

\* No change.

## PERSONS EMPLOYED: BY INDUSTRIES. AGGREGATES, BY MONTHS.

1890, 1891.

[This presentation shows the aggregate number of persons employed, by sex, during each month of the years 1890 and 1891, for all the establishments considered in each industry.]

### AGRICULTURAL IMPLEMENTS. [11 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	690	-	690	704	-	704
February, . . . . .	698	-	698	705	-	705
March, . . . . .	704	-	704	718	-	718
April, . . . . .	712	-	712	704	-	704
May, . . . . .	708	-	708	703	-	703
June, . . . . .	717	-	717	670	-	670
July, . . . . .	690	-	690	653	-	653
August, . . . . .	657	-	657	586	-	586
September, . . . . .	651	-	651	602	-	602
October, . . . . .	681	-	681	681	-	681
November, . . . . .	680	-	680	701	-	701
December, . . . . .	696	-	696	687	-	687

### ARMS AND AMMUNITION. [12 Establishments.]

January, . . . . .	1,656	181	1,837	1,763	177	1,940
February, . . . . .	1,658	164	1,822	1,814	179	1,993
March, . . . . .	1,649	175	1,824	1,865	182	2,047
April, . . . . .	1,690	156	1,846	1,907	161	2,068
May, . . . . .	1,685	173	1,858	1,946	181	2,127
June, . . . . .	1,706	151	1,857	1,986	165	2,151
July, . . . . .	1,711	182	1,893	1,834	163	2,097
August, . . . . .	1,677	151	1,828	1,963	183	2,146
September, . . . . .	1,664	159	1,823	1,946	189	2,135
October, . . . . .	1,702	190	1,892	1,982	198	2,180
November, . . . . .	1,676	189	1,865	1,969	189	2,158
December, . . . . .	1,731	151	1,882	1,920	180	2,100

### ARTISANS' TOOLS. [56 Establishments.]

January, . . . . .	1,613	54	1,667	1,629	61	1,690
February, . . . . .	1,632	57	1,689	1,645	59	1,704
March, . . . . .	1,613	57	1,670	1,623	60	1,686
April, . . . . .	1,638	56	1,694	1,617	60	1,677
May, . . . . .	1,658	59	1,717	1,620	60	1,680
June, . . . . .	1,623	56	1,679	1,622	59	1,681
July, . . . . .	1,594	49	1,643	1,595	53	1,648
August, . . . . .	1,594	48	1,642	1,600	57	1,657
September, . . . . .	1,620	58	1,678	1,601	58	1,659
October, . . . . .	1,604	54	1,658	1,636	63	1,699
November, . . . . .	1,617	52	1,669	1,637	61	1,698
December, . . . . .	1,618	56	1,674	1,642	63	1,705

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## AWNINGS, SAILS, TENTS, ETC. [30 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	112	18	130	112	17	129
February, . . . . .	109	21	130	114	20	134
March, . . . . .	118	25	138	116	23	138
April, . . . . .	119	35	154	117	29	146
May, . . . . .	181	38	169	127	35	162
June, . . . . .	181	87	168	126	34	160
July, . . . . .	126	36	162	122	27	149
August, . . . . .	127	81	158	122	23	145
September, . . . . .	132	25	157	122	19	141
October, . . . . .	134	24	158	146	19	164
November, . . . . .	132	18	150	140	18	158
December, . . . . .	121	16	137	115	16	131

## BOOTS AND SHOES. [567 Establishments.]

January, . . . . .	30,440	12,059	42,499	30,650	12,652	43,302
February, . . . . .	31,081	12,158	43,239	31,079	12,897	43,976
March, . . . . .	31,243	12,190	43,433	31,230	12,838	44,068
April, . . . . .	31,252	12,129	43,381	30,539	12,654	43,193
May, . . . . .	31,901	12,405	44,306	31,133	12,909	44,042
June, . . . . .	33,201	12,777	45,978	31,228	12,808	44,036
July, . . . . .	33,142	12,620	45,762	31,114	12,490	43,604
August, . . . . .	34,202	13,228	47,430	31,656	12,725	44,381
September, . . . . .	33,874	13,221	47,095	31,250	12,757	44,007
October, . . . . .	33,253	12,803	46,056	30,341	12,590	42,931
November, . . . . .	31,447	12,343	43,790	29,231	12,017	41,248
December, . . . . .	30,656	12,146	42,802	29,341	12,087	41,428

## BOXES (PAPER AND WOODEN). [141 Establishments.]

January, . . . . .	1,835	1,819	3,154	1,900	1,285	3,185
February, . . . . .	1,863	1,361	3,224	1,911	1,312	3,223
March, . . . . .	1,892	1,384	3,276	1,902	1,384	3,236
April, . . . . .	1,920	1,361	3,281	1,931	1,329	3,280
May, . . . . .	1,913	1,353	3,266	1,940	1,295	3,235
June, . . . . .	1,877	1,358	3,235	1,790	1,298	3,088
July, . . . . .	1,796	1,312	3,108	1,818	1,237	3,055
August, . . . . .	1,793	1,329	3,122	1,805	1,253	3,058
September, . . . . .	1,816	1,379	3,195	1,811	1,306	3,117
October, . . . . .	1,873	1,435	3,308	1,901	1,336	3,237
November, . . . . .	1,905	1,396	3,301	1,877	1,326	3,203
December, . . . . .	1,890	1,358	3,248	1,855	1,286	3,141

## BRICK, TILES, AND SEWER PIPE. [45 Establishments.]

January, . . . . .	407	11	418	481	6	487
February, . . . . .	398	11	409	475	6	481
March, . . . . .	455	11	466	553	6	559
April, . . . . .	1,150	11	1,161	1,151	6	1,157
May, . . . . .	1,866	11	1,877	1,905	6	1,911
June, . . . . .	1,867	11	1,878	1,897	6	1,903
July, . . . . .	1,867	10	1,877	1,858	5	1,863
August, . . . . .	1,817	10	1,827	1,865	9	1,874
September, . . . . .	1,661	10	1,671	1,752	11	1,763
October, . . . . .	1,187	9	1,196	1,226	8	1,234
November, . . . . .	765	6	771	742	6	748
December, . . . . .	450	6	456	546	6	552



## PERSONS EMPLOYED: BY INDUSTRIES — Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## BROOMS, BRUSHES, AND MOPS. [21 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	479	309	788	481	315	796
February, . . . . .	473	313	786	483	312	795
March, . . . . .	470	327	797	484	328	812
April, . . . . .	457	306	763	461	319	780
May, . . . . .	456	306	762	462	317	779
June, . . . . .	446	304	750	471	329	800
July, . . . . .	445	291	736	461	318	779
August, . . . . .	444	285	729	466	320	786
September, . . . . .	445	290	735	469	317	786
October, . . . . .	451	289	740	470	325	795
November, . . . . .	462	282	744	466	321	787
December, . . . . .	478	295	773	473	319	792

## BURIAL CASES, CASKETS, COFFINS, ETC. [6 Establishments.]

January, . . . . .	171	40	211	181	40	221
February, . . . . .	171	40	211	181	42	223
March, . . . . .	173	40	213	179	42	221
April, . . . . .	174	39	213	179	43	222
May, . . . . .	172	38	210	180	43	223
June, . . . . .	171	37	208	180	41	221
July, . . . . .	171	36	207	182	42	224
August, . . . . .	172	36	208	182	41	223
September, . . . . .	170	37	207	179	42	221
October, . . . . .	171	37	208	179	42	221
November, . . . . .	168	37	205	178	41	219
December, . . . . .	169	37	206	178	38	216

## BUTTONS AND DRESS TRIMMINGS. [17 Establishments.]

January, . . . . .	292	685	977	306	851	1,157
February, . . . . .	294	761	1,055	309	935	1,244
March, . . . . .	309	840	1,149	304	955	1,259
April, . . . . .	287	798	1,085	304	961	1,265
May, . . . . .	294	756	1,050	301	913	1,214
June, . . . . .	286	738	1,024	307	865	1,172
July, . . . . .	293	731	1,024	313	836	1,149
August, . . . . .	282	690	972	318	845	1,163
September, . . . . .	289	745	1,034	309	825	1,134
October, . . . . .	324	789	1,113	312	882	1,194
November, . . . . .	333	821	1,154	314	889	1,203
December, . . . . .	362	818	1,180	311	901	1,212

## CARPETINGS. [12 Establishments.]

January, . . . . .	2,130	2,460	4,590	2,140	2,589	4,729
February, . . . . .	2,146	2,559	4,705	2,155	2,615	4,770
March, . . . . .	2,131	2,549	4,680	2,189	2,601	4,790
April, . . . . .	2,092	2,535	4,627	2,160	2,508	4,668
May, . . . . .	2,089	2,501	4,590	2,133	2,513	4,646
June, . . . . .	2,120	2,487	4,607	2,137	2,567	4,704
July, . . . . .	2,124	2,475	4,599	2,140	2,529	4,669
August, . . . . .	2,109	2,458	4,567	2,115	2,520	4,635
September, . . . . .	2,106	2,542	4,648	2,134	2,531	4,665
October, . . . . .	2,144	2,556	4,700	2,079	2,464	4,543
November, . . . . .	2,171	2,465	4,636	2,144	2,519	4,663
December, . . . . .	2,156	2,510	4,666	2,126	2,458	4,584

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## CARRIAGES AND WAGONS. [96 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	2,124	17	2,141	2,258	35	2,293
February, . . . . .	2,174	19	2,193	2,296	35	2,331
March, . . . . .	2,287	42	2,329	2,408	36	2,444
April, . . . . .	2,370	41	2,411	2,562	36	2,598
May, . . . . .	2,469	41	2,510	2,652	35	2,687
June, . . . . .	2,476	40	2,516	2,645	27	2,672
July, . . . . .	2,341	38	2,379	2,353	26	2,379
August, . . . . .	2,210	37	2,247	2,178	26	2,204
September, . . . . .	2,008	35	2,041	1,993	35	2,028
October, . . . . .	2,074	32	2,106	1,900	33	1,933
November, . . . . .	1,982	33	2,015	1,902	33	1,935
December, . . . . .	1,994	26	2,020	1,904	33	1,937

## CEMENT, KAOLIN, LIME, AND PLASTER. [4 Establishments.]

January, . . . . .	53	-	53	52	-	52
February, . . . . .	53	-	53	52	-	52
March, . . . . .	55	-	55	49	-	49
April, . . . . .	73	-	73	52	-	52
May, . . . . .	80	-	80	81	-	81
June, . . . . .	82	-	82	63	-	63
July, . . . . .	78	-	78	58	-	58
August, . . . . .	72	-	72	60	-	60
September, . . . . .	73	-	73	59	-	59
October, . . . . .	76	-	76	61	-	61
November, . . . . .	66	-	66	61	-	61
December, . . . . .	63	-	63	48	-	48

## CHEMICAL PREPARATIONS (COMPOUNDED). [9 Establishments.]

January, . . . . .	259	2	261	251	2	253
February, . . . . .	259	2	261	252	2	254
March, . . . . .	261	2	263	285	2	287
April, . . . . .	265	2	267	289	2	291
May, . . . . .	265	2	267	275	2	277
June, . . . . .	264	2	266	267	3	270
July, . . . . .	264	2	266	279	3	282
August, . . . . .	261	2	263	279	3	282
September, . . . . .	269	2	271	287	3	290
October, . . . . .	273	2	275	284	2	286
November, . . . . .	272	2	274	282	2	284
December, . . . . .	273	2	275	289	2	291

## CLOCKS, WATCHES, AND JEWELRY. [77 Establishments.]

January, . . . . .	2,509	966	3,475	2,661	955	3,616
February, . . . . .	2,493	965	3,458	2,611	958	3,569
March, . . . . .	2,449	917	3,366	2,508	939	3,447
April, . . . . .	2,357	852	3,209	2,447	893	3,340
May, . . . . .	2,309	841	3,150	2,358	833	3,191
June, . . . . .	2,484	919	3,403	2,472	874	3,346
July, . . . . .	2,566	970	3,536	2,492	874	3,366
August, . . . . .	2,405	893	3,298	2,440	869	3,309
September, . . . . .	2,576	975	3,551	2,508	888	3,396
October, . . . . .	2,586	996	3,582	2,561	897	3,448
November, . . . . .	2,555	971	3,526	2,553	861	3,414
December, . . . . .	2,610	933	3,443	2,428	846	3,274

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## CLOTHING. [113 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	2,451	5,120	7,571	2,379	5,484	7,863
February, . . . . .	2,508	5,363	7,871	2,438	5,600	8,038
March, . . . . .	2,586	5,743	8,329	2,521	5,828	8,349
April, . . . . .	2,595	5,851	8,446	2,513	5,980	8,493
May, . . . . .	2,610	5,817	8,427	2,524	5,964	8,488
June, . . . . .	2,590	5,618	8,208	2,470	5,769	8,239
July, . . . . .	2,533	5,268	7,801	2,393	5,318	7,711
August, . . . . .	2,524	4,964	7,488	2,331	4,922	7,253
September, . . . . .	2,686	5,678	8,364	2,487	5,563	7,990
October, . . . . .	2,739	6,031	8,770	2,519	5,825	8,344
November, . . . . .	2,733	5,927	8,660	2,495	5,743	8,238
December, . . . . .	2,701	5,655	8,356	2,437	5,547	7,984

## COOKING, LIGHTING, AND HEATING APPARATUS. [31 Establishments.]

January, . . . . .	1,750	11	1,761	1,811	17	1,828
February, . . . . .	1,952	20	1,972	1,977	19	1,996
March, . . . . .	2,045	20	2,065	2,125	18	2,143
April, . . . . .	2,088	20	2,108	2,184	19	2,203
May, . . . . .	2,070	22	2,092	2,206	20	2,226
June, . . . . .	2,043	23	2,066	2,192	20	2,212
July, . . . . .	2,041	23	2,064	2,192	19	2,211
August, . . . . .	2,123	25	2,148	2,323	20	2,343
September, . . . . .	2,182	28	2,210	2,399	24	2,423
October, . . . . .	2,196	31	2,229	2,402	26	2,428
November, . . . . .	2,202	32	2,234	2,381	23	2,404
December, . . . . .	2,137	29	2,166	2,256	23	2,279

## CORDAGE AND TWINE. [25 Establishments.]

January, . . . . .	1,781	1,393	3,154	2,034	1,654	3,688
February, . . . . .	1,804	1,467	3,271	2,039	1,668	3,707
March, . . . . .	1,903	1,621	3,524	2,024	1,697	3,721
April, . . . . .	1,944	1,598	3,542	2,028	1,651	3,679
May, . . . . .	1,974	1,606	3,580	2,155	1,719	3,874
June, . . . . .	1,912	1,448	3,360	2,200	1,684	3,884
July, . . . . .	1,861	1,437	3,298	2,070	1,526	3,596
August, . . . . .	1,712	1,346	3,058	1,738	1,398	3,136
September, . . . . .	1,714	1,341	3,055	1,735	1,440	3,175
October, . . . . .	1,748	1,315	3,063	1,861	1,426	3,287
November, . . . . .	1,689	1,323	3,012	2,035	1,493	3,528
December, . . . . .	1,753	1,444	3,197	2,238	1,604	3,842

## CORKS, BUNGS, AND TAPS. [4 Establishments.]

January, . . . . .	29	11	40	32	10	42
February, . . . . .	31	12	43	32	10	42
March, . . . . .	29	13	42	31	9	40
April, . . . . .	35	13	48	34	8	42
May, . . . . .	34	11	45	36	9	45
June, . . . . .	34	12	46	36	9	45
July, . . . . .	34	11	45	39	9	48
August, . . . . .	35	12	47	35	9	44
September, . . . . .	35	11	46	33	8	41
October, . . . . .	32	12	44	33	8	41
November, . . . . .	32	13	45	30	8	38
December, . . . . .	32	12	44	30	10	40

PERSONS EMPLOYED: BY INDUSTRIES—Continued.  
 AGGREGATES, BY MONTHS—1890, 1891—Continued.  
 COTTON GOODS. [157 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	33,241	36,744	69,985	34,403	38,011	72,414
February, . . . . .	33,452	37,084	70,536	34,305	38,027	72,332
March, . . . . .	33,310	37,079	70,389	34,204	38,006	72,210
April, . . . . .	33,413	37,188	70,601	33,864	38,103	71,967
May, . . . . .	33,231	37,178	70,409	33,524	38,055	71,579
June, . . . . .	33,289	37,201	70,490	33,443	38,032	71,475
July, . . . . .	33,016	36,616	69,632	33,861	37,719	71,580
August, . . . . .	33,135	36,814	69,949	33,904	37,381	71,285
September, . . . . .	33,455	37,118	70,573	33,992	37,546	71,538
October, . . . . .	33,729	37,692	71,421	34,079	38,017	72,096
November, . . . . .	33,791	37,722	71,513	34,249	38,235	72,484
December, . . . . .	33,896	37,739	71,635	34,249	38,308	72,557

COTTON, WOOLLEN, AND OTHER TEXTILES. [3 Establishments.]

January, . . . . .	945	1,052	1,997	1,049	1,152	2,201
February, . . . . .	960	1,127	2,087	1,083	1,184	2,267
March, . . . . .	1,010	1,169	2,179	1,110	1,221	2,331
April, . . . . .	1,022	1,154	2,176	1,105	1,278	2,383
May, . . . . .	999	1,178	2,177	1,122	1,255	2,377
June, . . . . .	1,017	1,194	2,211	1,124	1,237	2,361
July, . . . . .	1,008	1,212	2,220	1,160	1,213	2,363
August, . . . . .	1,021	1,181	2,152	1,096	1,173	2,269
September, . . . . .	982	1,140	2,122	1,109	1,160	2,269
October, . . . . .	965	1,173	2,138	1,115	1,201	2,316
November, . . . . .	967	1,093	2,060	1,013	1,209	2,222
December, . . . . .	935	1,150	2,085	1,036	1,199	2,235

CRAYONS, PENCILS, CRUCIBLES, ETC. [4 Establishments.]

January, . . . . .	50	-	50	42	-	42
February, . . . . .	50	-	50	41	-	41
March, . . . . .	50	-	50	43	-	43
April, . . . . .	50	-	50	44	-	44
May, . . . . .	49	-	49	45	-	45
June, . . . . .	49	-	49	46	-	46
July, . . . . .	48	-	48	45	-	45
August, . . . . .	49	-	49	44	-	44
September, . . . . .	49	-	49	44	-	44
October, . . . . .	49	-	49	43	-	43
November, . . . . .	49	-	49	39	-	39
December, . . . . .	49	-	49	40	-	40

DRUGS AND MEDICINES. [19 Establishments.]

January, . . . . .	198	162	360	215	178	393
February, . . . . .	202	169	371	222	194	416
March, . . . . .	214	171	385	228	188	416
April, . . . . .	213	172	385	231	197	428
May, . . . . .	219	174	393	237	190	427
June, . . . . .	214	167	371	243	198	441
July, . . . . .	204	149	353	243	203	446
August, . . . . .	211	150	361	251	174	425
September, . . . . .	209	159	368	242	198	441
October, . . . . .	204	164	368	242	210	452
November, . . . . .	206	180	386	226	219	445
December, . . . . .	212	187	399	226	213	439

PERSONS EMPLOYED: BY INDUSTRIES—Continued.  
 AGGREGATES, BY MONTHS—1890, 1891—Continued.

## DYESTUFFS. [7 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	199	5	204	205	5	210
February, . . . . .	202	9	211	208	9	217
March, . . . . .	204	9	213	213	9	222
April, . . . . .	206	9	215	208	10	218
May, . . . . .	209	9	218	194	9	203
June, . . . . .	211	9	220	203	8	211
July, . . . . .	214	9	223	206	13	219
August, . . . . .	214	9	223	211	13	224
September, . . . . .	213	8	221	212	13	225
October, . . . . .	217	9	226	213	9	222
November, . . . . .	209	10	219	212	9	221
December, . . . . .	199	9	208	212	8	220

## EARTHEN, PLASTER, AND STONE WARE. [4 Establishments.]

January, . . . . .	186	19	205	155	16	171
February, . . . . .	190	18	208	154	23	177
March, . . . . .	195	20	215	162	22	184
April, . . . . .	196	25	221	167	26	193
May, . . . . .	200	25	225	218	25	243
June, . . . . .	199	25	224	224	28	252
July, . . . . .	195	22	217	217	27	244
August, . . . . .	200	25	225	229	34	263
September, . . . . .	206	27	233	230	31	261
October, . . . . .	200	27	227	236	32	268
November, . . . . .	201	25	226	177	28	205
December, . . . . .	199	25	224	117	9	126

## ELECTRICAL APPARATUS AND APPLIANCES. [5 Establishments.]

January, . . . . .	2,206	326	2,532	2,139	309	2,448
February, . . . . .	2,248	310	2,558	1,994	310	2,304
March, . . . . .	2,271	300	2,571	1,928	288	2,216
April, . . . . .	2,251	312	2,563	2,078	300	2,378
May, . . . . .	2,141	321	2,462	2,144	300	2,444
June, . . . . .	2,091	304	2,395	2,297	305	2,602
July, . . . . .	2,120	291	2,411	2,406	323	2,729
August, . . . . .	2,217	300	2,517	2,511	332	2,843
September, . . . . .	2,361	318	2,679	2,667	350	3,017
October, . . . . .	2,600	306	2,906	2,287	350	2,637
November, . . . . .	2,597	311	2,908	2,716	352	3,068
December, . . . . .	2,309	320	2,629	2,870	353	3,223

## ELECTROPLATING. [10 Establishments.]

January, . . . . .	67	3	70	69	4	73
February, . . . . .	69	3	72	71	4	75
March, . . . . .	70	3	73	72	4	76
April, . . . . .	70	3	73	73	4	77
May, . . . . .	71	3	74	73	4	77
June, . . . . .	74	3	77	74	4	78
July, . . . . .	75	3	78	75	4	79
August, . . . . .	76	3	79	74	4	78
September, . . . . .	79	4	83	76	4	80
October, . . . . .	83	4	87	81	4	85
November, . . . . .	80	4	84	80	4	84
December, . . . . .	81	4	85	78	4	82

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## EMERY AND SAND PAPER AND CLOTH, ETC. [13 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	264	10	274	305	10	315
February, . . . . .	266	10	276	303	10	313
March, . . . . .	273	10	283	316	10	326
April, . . . . .	277	10	287	333	10	343
May, . . . . .	268	10	278	335	10	345
June, . . . . .	271	10	281	342	10	352
July, . . . . .	263	10	273	332	10	342
August, . . . . .	269	10	279	341	10	351
September, . . . . .	274	10	284	327	10	337
October, . . . . .	272	10	282	326	10	336
November, . . . . .	280	10	290	322	10	332
December, . . . . .	272	10	282	323	10	333

## FANCY ARTICLES. [6 Establishments.]

January, . . . . .	45	196	241	41	187	228
February, . . . . .	46	197	243	40	179	219
March, . . . . .	48	198	246	42	178	220
April, . . . . .	48	180	228	42	175	217
May, . . . . .	48	174	222	40	174	214
June, . . . . .	49	181	230	40	172	212
July, . . . . .	46	190	236	40	165	205
August, . . . . .	47	194	241	39	190	229
September, . . . . .	49	205	254	41	187	228
October, . . . . .	48	196	244	40	180	220
November, . . . . .	50	213	263	41	175	216
December, . . . . .	52	228	280	39	172	211

## FERTILIZERS. [7 Establishments.]

January, . . . . .	59	-	59	51	-	51
February, . . . . .	64	-	64	56	-	56
March, . . . . .	80	-	80	72	-	72
April, . . . . .	99	-	99	93	-	93
May, . . . . .	69	-	69	62	-	62
June, . . . . .	54	-	54	42	-	42
July, . . . . .	50	-	50	42	-	42
August, . . . . .	50	-	50	42	-	42
September, . . . . .	51	-	51	43	-	43
October, . . . . .	53	-	53	44	-	44
November, . . . . .	53	-	53	45	-	45
December, . . . . .	54	-	54	43	-	43

## FINE ARTS AND TAXIDERMY. [2 Establishments.]

January, . . . . .	8	-	8	7	-	7
February, . . . . .	8	-	8	6	-	6
March, . . . . .	7	-	7	7	-	7
April, . . . . .	7	-	7	7	-	7
May, . . . . .	6	-	6	6	-	6
June, . . . . .	5	-	5	4	-	4
July, . . . . .	5	-	5	4	-	4
August, . . . . .	5	-	5	4	-	4
September, . . . . .	7	-	7	5	1	6
October, . . . . .	7	-	7	8	1	9
November, . . . . .	7	-	7	9	2	11
December, . . . . .	8	-	8	9	2	11

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## FIREWORKS AND MATCHES. [3 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	42	10	52	52	18	70
February, . . . . .	42	15	57	55	20	75
March, . . . . .	44	21	65	57	18	75
April, . . . . .	51	16	67	60	20	80
May, . . . . .	57	21	78	60	21	81
June, . . . . .	50	21	71	57	18	75
July, . . . . .	37	13	50	51	16	67
August, . . . . .	30	9	39	47	15	62
September, . . . . .	29	11	40	54	18	72
October, . . . . .	27	9	36	54	15	69
November, . . . . .	28	6	34	58	10	68
December, . . . . .	25	3	28	50	9	59

## FLAX, HEMP, JUTE, AND LINEN GOODS. [8 Establishments.]

January, . . . . .	892	785	1,677	983	914	1,897
February, . . . . .	878	801	1,679	984	928	1,912
March, . . . . .	913	830	1,743	981	936	1,917
April, . . . . .	979	870	1,849	980	933	1,913
May, . . . . .	1,049	867	1,916	978	925	1,903
June, . . . . .	1,087	906	1,993	981	920	1,901
July, . . . . .	1,073	918	1,991	978	902	1,880
August, . . . . .	1,105	906	2,011	999	891	1,890
September, . . . . .	1,074	894	1,968	1,001	895	1,896
October, . . . . .	1,029	876	1,905	996	903	1,899
November, . . . . .	1,019	876	1,895	992	907	1,899
December, . . . . .	1,008	865	1,873	983	887	1,870

## FOOD PREPARATIONS. [264 Establishments.]

January, . . . . .	4,601	1,234	5,835	5,640	1,254	6,894
February, . . . . .	4,735	1,314	6,049	5,029	1,366	6,395
March, . . . . .	5,036	1,308	6,344	5,217	1,417	6,634
April, . . . . .	4,471	1,333	5,804	5,415	1,460	6,875
May, . . . . .	4,271	1,400	5,671	5,356	1,429	6,785
June, . . . . .	4,615	1,455	6,070	5,474	1,503	6,977
July, . . . . .	4,770	1,464	6,234	5,554	1,507	7,061
August, . . . . .	4,940	1,507	6,447	5,560	1,551	7,111
September, . . . . .	5,133	1,740	6,873	5,665	1,703	7,368
October, . . . . .	5,239	1,722	6,961	5,783	1,645	7,428
November, . . . . .	5,129	1,730	6,859	5,755	1,604	7,359
December, . . . . .	5,215	1,592	6,807	5,700	1,510	7,210

## FURNITURE. [120 Establishments.]

January, . . . . .	4,164	375	4,539	4,459	433	4,892
February, . . . . .	4,247	365	4,612	4,456	444	4,900
March, . . . . .	4,392	408	4,800	4,580	447	5,027
April, . . . . .	4,444	442	4,886	4,659	454	5,113
May, . . . . .	4,468	463	4,931	4,660	465	5,125
June, . . . . .	4,429	454	4,883	4,575	464	5,039
July, . . . . .	4,312	440	4,752	4,420	409	4,829
August, . . . . .	4,383	443	4,826	4,392	419	4,811
September, . . . . .	4,570	462	5,032	4,532	448	4,980
October, . . . . .	4,629	477	5,106	4,676	472	5,148
November, . . . . .	4,645	500	5,145	4,599	482	5,081
December, . . . . .	4,504	445	4,949	4,507	465	4,972

PERSONS EMPLOYED: BY INDUSTRIES—Continued.  
AGGREGATES, BY MONTHS—1890, 1891—Continued.

## GLASS. [10 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	457	29	486	439	35	524
February, . . . . .	457	29	486	491	35	526
March, . . . . .	457	29	486	494	35	529
April, . . . . .	450	29	479	485	35	520
May, . . . . .	422	29	451	435	35	470
June, . . . . .	394	29	423	427	35	462
July, . . . . .	347	24	371	408	35	443
August, . . . . .	382	26	408	406	35	441
September, . . . . .	445	29	474	445	35	480
October, . . . . .	454	28	482	450	34	484
November, . . . . .	449	28	477	443	34	477
December, . . . . .	451	28	479	469	33	502

## GLUE, ISINGLASS, AND STARCH. [14 Establishments.]

January, . . . . .	445	50	495	444	54	498
February, . . . . .	441	56	497	454	62	516
March, . . . . .	442	56	498	456	70	526
April, . . . . .	358	38	396	405	51	456
May, . . . . .	378	41	419	373	48	421
June, . . . . .	283	32	315	303	38	341
July, . . . . .	238	16	254	232	24	256
August, . . . . .	210	14	224	227	17	244
September, . . . . .	225	20	245	234	15	249
October, . . . . .	320	37	357	346	39	385
November, . . . . .	351	38	389	366	39	405
December, . . . . .	501	36	537	455	53	508

## HAIR WORK (ANIMAL AND HUMAN). [10 Establishments.]

January, . . . . .	91	106	197	93	107	200
February, . . . . .	90	105	195	97	106	203
March, . . . . .	90	102	192	103	105	208
April, . . . . .	103	104	207	101	101	202
May, . . . . .	107	122	229	107	102	209
June, . . . . .	110	133	243	100	96	196
July, . . . . .	106	117	223	104	99	203
August, . . . . .	102	113	215	104	104	208
September, . . . . .	105	120	225	97	111	208
October, . . . . .	101	112	213	98	108	206
November, . . . . .	96	114	210	96	110	206
December, . . . . .	91	116	207	96	109	205

## HOSE: RUBBER, LINEN, ETC. [5 Establishments.]

January, . . . . .	169	19	188	186	43	229
February, . . . . .	146	27	173	217	48	265
March, . . . . .	171	32	203	203	52	255
April, . . . . .	168	29	197	170	48	218
May, . . . . .	161	30	191	173	51	224
June, . . . . .	154	30	184	174	47	221
July, . . . . .	139	28	167	172	46	218
August, . . . . .	124	26	150	169	47	216
September, . . . . .	121	25	146	158	47	205
October, . . . . .	116	25	141	176	47	223
November, . . . . .	128	25	153	192	56	248
December, . . . . .	164	30	194	214	55	269



## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## HOSIERY AND KNIT GOODS. [40 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	1,112	2,746	3,858	1,243	3,658	4,901
February, . . . . .	1,141	2,924	4,065	1,326	3,835	5,161
March, . . . . .	1,151	3,083	4,234	1,387	3,920	5,307
April, . . . . .	1,135	3,031	4,166	1,366	3,955	5,321
May, . . . . .	1,097	2,787	3,884	1,303	3,868	5,171
June, . . . . .	1,101	2,844	3,945	1,322	3,715	5,037
July, . . . . .	1,080	2,820	3,900	1,355	3,607	4,962
August, . . . . .	1,056	2,734	3,790	1,314	3,598	4,912
September, . . . . .	1,138	2,980	4,118	1,374	3,635	5,009
October, . . . . .	1,177	3,145	4,322	1,365	3,892	5,257
November, . . . . .	1,237	3,086	4,323	1,406	3,934	5,340
December, . . . . .	1,186	3,034	4,220	1,358	3,877	5,235

## INK, MUCILAGE, AND PASTE. [8 Establishments.]

January, . . . . .	64	48	112	64	49	113
February, . . . . .	64	48	112	64	49	113
March, . . . . .	66	49	115	65	51	116
April, . . . . .	67	51	118	65	51	116
May, . . . . .	67	51	118	65	51	116
June, . . . . .	67	51	118	65	51	116
July, . . . . .	66	46	112	64	49	113
August, . . . . .	66	46	112	64	46	110
September, . . . . .	67	47	114	65	50	116
October, . . . . .	67	50	117	66	53	119
November, . . . . .	66	49	115	65	51	116
December, . . . . .	65	49	114	64	49	113

## IVORY, BONE, SHELL, AND HORN GOODS, ETC. [13 Establishments.]

January, . . . . .	396	72	468	426	72	498
February, . . . . .	430	79	509	446	74	520
March, . . . . .	438	77	515	447	83	530
April, . . . . .	420	65	485	426	79	505
May, . . . . .	406	63	469	407	78	485
June, . . . . .	357	55	412	406	77	483
July, . . . . .	375	62	437	402	78	480
August, . . . . .	413	60	473	385	66	451
September, . . . . .	403	73	476	401	68	469
October, . . . . .	363	66	429	419	72	491
November, . . . . .	362	60	422	436	70	506
December, . . . . .	356	61	417	448	70	518

## LEATHER. [154 Establishments.]

January, . . . . .	5,784	86	5,870	5,503	120	5,623
February, . . . . .	6,094	92	6,186	5,677	133	5,810
March, . . . . .	6,106	86	6,192	5,806	125	5,931
April, . . . . .	6,156	111	6,267	5,741	125	5,866
May, . . . . .	6,152	125	6,277	5,561	122	5,683
June, . . . . .	6,303	125	6,428	5,478	122	5,600
July, . . . . .	6,300	127	6,427	5,345	124	5,469
August, . . . . .	6,288	111	6,399	5,318	126	5,444
September, . . . . .	5,835	117	5,952	5,140	120	5,260
October, . . . . .	5,758	122	5,880	5,255	131	5,386
November, . . . . .	5,766	112	5,878	5,296	123	5,419
December, . . . . .	5,718	75	5,793	5,324	125	5,449

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## LIQUORS AND BEVERAGES (NOT SPIRITUOUS). [12 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	90	-	90	98	-	98
February, . . . . .	90	-	90	98	-	98
March, . . . . .	88	-	88	102	-	102
April, . . . . .	100	-	100	112	-	112
May, . . . . .	116	-	116	128	-	128
June, . . . . .	146	-	146	161	-	161
July, . . . . .	153	-	153	164	-	164
August, . . . . .	154	-	154	162	-	162
September, . . . . .	131	-	131	139	-	139
October, . . . . .	110	-	110	127	-	127
November, . . . . .	92	-	92	117	-	117
December, . . . . .	96	-	96	104	-	104

## LIQUORS: MALT, DISTILLED, AND FERMENTED. [49 Establishments.]

January, . . . . .	875	2	877	902	2	904
February, . . . . .	874	2	876	905	2	907
March, . . . . .	852	2	854	917	2	919
April, . . . . .	879	1	880	958	2	960
May, . . . . .	892	1	893	984	3	987
June, . . . . .	912	1	913	1,018	3	1,021
July, . . . . .	959	2	961	1,065	3	1,068
August, . . . . .	971	2	973	1,067	2	1,069
September, . . . . .	960	2	962	1,061	2	1,063
October, . . . . .	981	2	983	1,108	2	1,110
November, . . . . .	973	2	975	1,073	2	1,075
December, . . . . .	902	2	904	998	2	1,000

## LUMBER. [25 Establishments.]

January, . . . . .	655	25	680	604	25	629
February, . . . . .	649	23	672	617	25	642
March, . . . . .	608	23	721	686	26	712
April, . . . . .	734	24	758	751	25	776
May, . . . . .	742	23	765	749	10	759
June, . . . . .	729	24	753	734	10	744
July, . . . . .	722	7	729	783	11	794
August, . . . . .	728	6	734	748	11	759
September, . . . . .	765	25	790	778	11	789
October, . . . . .	803	25	828	793	10	803
November, . . . . .	803	24	827	882	11	893
December, . . . . .	717	24	741	730	11	741

## MACHINES AND MACHINERY. [263 Establishments]

January, . . . . .	15,146	145	15,291	15,951	163	16,114
February, . . . . .	15,055	151	15,206	15,776	165	15,941
March, . . . . .	15,097	156	15,253	15,757	167	15,924
April, . . . . .	15,182	155	15,337	15,923	163	16,086
May, . . . . .	15,148	162	15,310	16,053	163	16,216
June, . . . . .	15,176	157	15,333	15,942	160	16,102
July, . . . . .	15,273	149	15,422	15,839	155	15,994
August, . . . . .	15,447	152	15,599	15,799	140	15,939
September, . . . . .	15,781	163	15,949	15,980	157	16,137
October, . . . . .	16,271	176	16,447	16,142	155	16,297
November, . . . . .	16,462	177	16,639	16,062	156	16,218
December, . . . . .	16,392	169	16,561	15,953	154	16,107

PERSONS EMPLOYED: BY INDUSTRIES—Continued.  
 AGGREGATES, BY MONTHS—1890, 1891—Continued.  
 METALS AND METALLIC GOODS. [277 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	15,496	1,406	16,902	15,745	1,529	17,274
February, . . . . .	15,480	1,408	16,888	15,742	1,499	17,241
March, . . . . .	15,474	1,428	16,902	15,701	1,528	17,229
April, . . . . .	15,361	1,423	16,784	15,780	1,529	17,309
May, . . . . .	15,393	1,394	16,787	15,886	1,496	17,182
June, . . . . .	15,461	1,412	16,873	15,633	1,470	17,108
July, . . . . .	15,330	1,385	16,715	15,623	1,460	17,083
August, . . . . .	15,555	1,426	16,981	15,700	1,457	17,157
September, . . . . .	15,882	1,454	17,336	16,109	1,485	17,594
October, . . . . .	16,092	1,475	17,567	16,468	1,473	17,941
November, . . . . .	16,186	1,476	17,662	16,487	1,497	17,984
December, . . . . .	16,214	1,479	17,693	16,349	1,507	17,856

MIXED TEXTILES. [13 Establishments.]

January, . . . . .	591	235	826	557	231	788
February, . . . . .	594	242	836	560	236	796
March, . . . . .	612	243	855	619	244	863
April, . . . . .	594	249	843	623	250	873
May, . . . . .	584	234	818	597	248	845
June, . . . . .	576	224	800	598	241	839
July, . . . . .	569	225	794	572	228	800
August, . . . . .	571	229	800	547	218	765
September, . . . . .	584	248	832	506	214	720
October, . . . . .	600	241	841	515	205	720
November, . . . . .	615	239	854	518	200	718
December, . . . . .	621	260	881	590	239	829

MODELS AND PATTERNS. [5 Establishments.]

January, . . . . .	40	1	41	40	1	41
February, . . . . .	39	1	40	39	1	40
March, . . . . .	39	1	40	41	1	42
April, . . . . .	39	1	40	40	1	41
May, . . . . .	38	1	39	41	1	42
June, . . . . .	36	1	37	38	1	39
July, . . . . .	36	1	37	40	1	41
August, . . . . .	39	1	40	40	1	41
September, . . . . .	43	1	44	43	1	44
October, . . . . .	42	1	43	40	—	40
November, . . . . .	41	2	43	43	—	43
December, . . . . .	39	2	41	41	1	42

MUSICAL INSTRUMENTS AND MATERIALS. [46 Establishments.]

January, . . . . .	2,773	76	2,849	2,671	79	2,750
February, . . . . .	2,773	76	2,849	2,617	79	2,696
March, . . . . .	2,821	78	2,899	2,623	77	2,700
April, . . . . .	2,825	77	2,902	2,633	75	2,708
May, . . . . .	2,823	76	2,899	2,603	73	2,676
June, . . . . .	2,797	78	2,875	2,583	74	2,657
July, . . . . .	2,804	79	2,883	2,551	71	2,622
August, . . . . .	2,753	77	2,830	2,549	70	2,619
September, . . . . .	2,803	77	2,880	2,612	70	2,682
October, . . . . .	2,857	80	2,937	2,637	71	2,708
November, . . . . .	2,861	84	2,945	2,648	72	2,720
December, . . . . .	2,838	86	2,924	2,685	73	2,758

PERSONS EMPLOYED: BY INDUSTRIES—Continued.  
 AGGREGATES, BY MONTHS—1890, 1891—Continued.  
 OILS AND ILLUMINATING FLUIDS. [9 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	183	15	198	212	28	240
February, . . . . .	184	15	199	212	28	240
March, . . . . .	185	15	200	151	28	179
April, . . . . .	145	15	160	145	28	173
May, . . . . .	142	13	155	145	27	172
June, . . . . .	130	13	143	139	18	157
July, . . . . .	131	13	144	134	18	152
August, . . . . .	133	13	146	130	18	148
September, . . . . .	138	14	152	131	19	150
October, . . . . .	145	14	159	137	18	155
November, . . . . .	104	14	208	142	19	161
December, . . . . .	104	14	208	210	28	238

PAINTS, COLORS, AND CRUDE CHEMICALS. [16 Establishments.]

January, . . . . .	231	17	248	211	15	226
February, . . . . .	232	18	250	224	14	238
March, . . . . .	230	19	258	227	14	241
April, . . . . .	231	20	251	237	14	251
May, . . . . .	230	21	251	243	19	262
June, . . . . .	219	20	239	243	16	259
July, . . . . .	217	20	237	226	14	240
August, . . . . .	217	19	236	224	15	239
September, . . . . .	211	17	228	230	13	243
October, . . . . .	215	16	231	229	12	241
November, . . . . .	216	16	232	219	11	230
December, . . . . .	224	17	241	208	11	219

PAPER AND PAPER GOODS. [102 Establishments ]

January, . . . . .	5,205	4,243	9,448	5,382	4,521	9,903
February, . . . . .	5,215	4,262	9,477	5,395	4,538	9,933
March, . . . . .	5,230	4,257	9,487	5,394	4,560	9,954
April, . . . . .	5,213	4,290	9,503	5,399	4,514	9,913
May, . . . . .	5,234	4,298	9,532	5,425	4,505	9,930
June, . . . . .	5,225	4,311	9,536	5,401	4,495	9,896
July, . . . . .	5,195	4,243	9,438	5,369	4,439	9,808
August, . . . . .	5,190	4,281	9,471	5,341	4,382	9,723
September, . . . . .	5,240	4,360	9,600	5,412	4,454	9,866
October, . . . . .	5,292	4,406	9,698	5,424	4,555	9,979
November, . . . . .	5,356	4,416	9,772	5,466	4,560	10,026
December, . . . . .	5,377	4,494	9,871	5,425	4,572	9,997

PERFUMES, TOILET ARTICLES, ETC. [4 Establishments.]

January, . . . . .	7	27	34	12	21	33
February, . . . . .	7	27	34	12	21	33
March, . . . . .	7	28	35	12	22	34
April, . . . . .	7	28	35	12	22	34
May, . . . . .	7	28	35	12	23	35
June, . . . . .	7	28	35	12	23	35
July, . . . . .	7	28	35	12	23	35
August, . . . . .	7	28	35	12	22	34
September, . . . . .	7	29	36	12	24	36
October, . . . . .	7	30	37	12	26	38
November, . . . . .	7	30	37	12	28	40
December, . . . . .	7	30	37	12	28	40

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## PHOTOGRAPHS AND PHOTOGRAPHIC MATERIALS. [11 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	92	59	151	81	60	141
February, . . . . .	92	59	151	81	59	140
March, . . . . .	92	61	153	85	60	145
April, . . . . .	94	59	153	85	59	144
May, . . . . .	98	61	159	84	59	143
June, . . . . .	98	63	161	84	62	146
July, . . . . .	92	57	149	73	59	132
August, . . . . .	84	51	135	69	54	123
September, . . . . .	93	56	149	75	61	136
October, . . . . .	94	58	152	80	63	143
November, . . . . .	94	59	153	82	65	147
December, . . . . .	99	65	164	87	67	154

## POLISHES AND DRESSING. [18 Establishments.]

January, . . . . .	125	64	189	128	88	216
February, . . . . .	125	79	204	125	85	210
March, . . . . .	127	101	228	120	99	209
April, . . . . .	131	103	234	117	98	215
May, . . . . .	133	102	235	114	108	217
June, . . . . .	134	107	241	113	110	223
July, . . . . .	133	100	233	109	110	219
August, . . . . .	130	107	237	111	112	223
September, . . . . .	134	114	248	117	117	234
October, . . . . .	134	112	246	120	113	233
November, . . . . .	133	108	241	118	91	209
December, . . . . .	130	84	214	118	86	204

## PRINTING, PUBLISHING, AND BOOKBINDING. [24 Establishments.]

January, . . . . .	1,210	545	1,755	1,207	643	1,850
February, . . . . .	1,170	527	1,697	1,199	578	1,777
March, . . . . .	1,188	529	1,717	1,174	544	1,718
April, . . . . .	1,213	542	1,755	1,186	542	1,728
May, . . . . .	1,205	527	1,732	1,212	565	1,777
June, . . . . .	1,235	528	1,763	1,229	586	1,815
July, . . . . .	1,207	527	1,734	1,253	535	1,788
August, . . . . .	1,170	519	1,689	1,211	532	1,743
September, . . . . .	1,174	548	1,722	1,237	564	1,801
October, . . . . .	1,188	572	1,760	1,241	577	1,818
November, . . . . .	1,212	622	1,834	1,240	591	1,831
December, . . . . .	1,243	635	1,878	1,275	621	1,896

## PRINT WORKS, DYE WORKS, AND BLEACHERIES. [37 Establishments.]

January, . . . . .	4,316	1,092	5,408	4,423	1,135	5,558
February, . . . . .	4,366	1,112	5,478	4,484	1,188	5,672
March, . . . . .	4,474	1,129	5,603	4,117	991	5,108
April, . . . . .	4,526	1,148	5,674	4,145	999	5,144
May, . . . . .	4,363	1,102	5,465	4,019	993	5,012
June, . . . . .	4,377	1,098	5,475	3,964	956	4,920
July, . . . . .	4,253	1,103	5,356	4,075	941	5,016
August, . . . . .	4,546	1,097	5,643	4,184	958	5,152
September, . . . . .	4,485	1,106	5,591	4,173	974	5,147
October, . . . . .	4,561	1,125	5,686	4,204	971	5,175
November, . . . . .	4,439	1,119	5,558	4,232	964	5,196
December, . . . . .	4,204	1,073	5,277	4,647	1,143	5,790

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## RAILROAD CONSTRUCTION AND EQUIPMENT. [14 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	2,688	-	2,688	2,887	-	2,887
February, . . . . .	2,718	-	2,718	2,833	-	2,833
March, . . . . .	2,754	-	2,754	2,792	-	2,792
April, . . . . .	2,792	-	2,792	2,746	-	2,746
May, . . . . .	2,767	-	2,767	2,715	-	2,715
June, . . . . .	2,826	-	2,826	2,615	-	2,615
July, . . . . .	2,836	-	2,836	2,546	-	2,546
August, . . . . .	2,768	-	2,768	2,547	-	2,547
September, . . . . .	2,741	-	2,741	2,565	-	2,565
October, . . . . .	2,688	-	2,688	2,682	-	2,682
November, . . . . .	2,687	-	2,687	2,766	-	2,766
December, . . . . .	2,752	-	2,752	2,839	-	2,839

## RUBBER AND ELASTIC GOODS. [30 Establishments.]

January, . . . . .	4,075	2,998	7,073	4,652	3,578	8,225
February, . . . . .	4,003	3,021	7,024	4,458	3,481	7,939
March, . . . . .	4,021	3,005	7,026	4,482	3,404	7,886
April, . . . . .	3,986	2,495	6,481	4,201	3,009	7,210
May, . . . . .	4,312	3,103	7,415	4,644	3,169	7,813
June, . . . . .	4,353	3,225	7,578	4,377	3,129	7,506
July, . . . . .	4,503	3,273	7,776	4,431	3,160	7,591
August, . . . . .	4,520	3,253	7,773	4,701	3,350	8,051
September, . . . . .	4,662	3,431	8,093	4,788	3,409	8,197
October, . . . . .	4,798	3,522	8,320	4,592	3,308	7,900
November, . . . . .	4,853	3,591	8,444	4,661	3,346	8,007
December, . . . . .	4,857	3,509	8,366	4,626	3,330	7,956

## SCIENTIFIC INSTRUMENTS AND APPLIANCES. [11 Establishments.]

January, . . . . .	760	86	846	839	119	958
February, . . . . .	755	84	839	896	120	1,018
March, . . . . .	770	84	854	918	124	1,042
April, . . . . .	792	83	875	922	111	1,033
May, . . . . .	795	85	880	894	109	1,003
June, . . . . .	808	77	880	893	109	1,002
July, . . . . .	805	80	885	849	121	970
August, . . . . .	810	86	896	846	119	965
September, . . . . .	827	85	912	860	118	978
October, . . . . .	827	93	920	866	119	985
November, . . . . .	848	105	953	863	117	980
December, . . . . .	856	99	955	852	113	965

## SHIPBUILDING. [42 Establishments.]

January, . . . . .	527	-	527	699	-	699
February, . . . . .	543	-	543	651	-	651
March, . . . . .	573	-	573	805	-	805
April, . . . . .	810	-	810	821	-	821
May, . . . . .	845	-	845	874	-	874
June, . . . . .	750	-	750	699	-	699
July, . . . . .	685	-	685	646	-	646
August, . . . . .	704	-	704	576	-	576
September, . . . . .	680	-	680	594	-	594
October, . . . . .	689	-	689	588	-	588
November, . . . . .	708	-	708	572	-	572
December, . . . . .	681	-	681	563	-	563

PERSONS EMPLOYED: BY INDUSTRIES—Continued.  
 AGGREGATES, BY MONTHS—1890, 1891—Continued.

## SILK AND SILK GOODS. [9 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	749	1,487	2,236	697	1,525	2,222
February, . . . . .	758	1,501	2,259	717	1,513	2,230
March, . . . . .	775	1,500	2,275	716	1,549	2,265
April, . . . . .	761	1,537	2,298	722	1,550	2,272
May, . . . . .	758	1,549	2,307	702	1,537	2,239
June, . . . . .	738	1,521	2,259	696	1,518	2,214
July, . . . . .	768	1,504	2,272	701	1,485	2,186
August, . . . . .	790	1,415	2,205	705	1,462	2,167
September, . . . . .	810	1,384	2,194	710	1,503	2,213
October, . . . . .	802	1,443	2,245	721	1,544	2,265
November, . . . . .	827	1,477	2,304	727	1,557	2,284
December, . . . . .	828	1,516	2,339	728	1,498	2,226

## SPORTING AND ATHLETIC GOODS. [9 Establishments.]

January, . . . . .	277	37	314	316	47	363
February, . . . . .	265	36	301	295	50	345
March, . . . . .	274	37	311	305	58	363
April, . . . . .	276	40	316	309	58	367
May, . . . . .	282	38	320	314	52	366
June, . . . . .	280	36	316	312	44	356
July, . . . . .	254	28	282	270	39	309
August, . . . . .	285	34	322	291	36	327
September, . . . . .	289	36	325	330	44	374
October, . . . . .	293	36	329	344	44	388
November, . . . . .	326	38	364	381	46	427
December, . . . . .	337	28	365	380	50	430

## STONE. [111 Establishments.]

January, . . . . .	2,914	-	2,914	2,730	-	2,730
February, . . . . .	3,002	-	3,002	2,788	-	2,788
March, . . . . .	3,109	-	3,109	2,964	-	2,964
April, . . . . .	3,449	-	3,449	3,402	-	3,402
May, . . . . .	3,116	-	3,116	3,544	-	3,544
June, . . . . .	3,606	-	3,606	3,635	-	3,635
July, . . . . .	3,675	-	3,675	3,726	-	3,726
August, . . . . .	3,747	-	3,747	3,864	-	3,864
September, . . . . .	3,812	-	3,812	3,927	-	3,927
October, . . . . .	3,798	-	3,798	3,853	-	3,853
November, . . . . .	3,619	-	3,619	3,595	-	3,595
December, . . . . .	3,256	-	3,256	3,047	-	3,047

## STRAW AND PALM LEAF GOODS. [17 Establishments.]

January, . . . . .	1,082	1,763	2,795	1,105	1,763	2,868
February, . . . . .	1,102	2,072	3,174	1,166	1,909	3,135
March, . . . . .	1,124	2,122	3,246	1,167	2,123	3,290
April, . . . . .	1,024	2,034	3,058	1,150	2,167	3,317
May, . . . . .	876	1,780	2,656	1,037	1,948	2,985
June, . . . . .	481	883	1,364	452	827	1,279
July, . . . . .	285	324	609	256	214	470
August, . . . . .	419	482	901	372	413	785
September, . . . . .	567	603	1,170	474	666	1,140
October, . . . . .	796	770	1,566	730	870	1,600
November, . . . . .	842	1,000	1,842	792	1,047	1,839
December, . . . . .	1,051	1,431	2,482	907	1,502	2,409

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## AGGREGATES, BY MONTHS—1890, 1891—Continued.

## TALLOW, CANDLES, SOAP, AND GREASE. [55 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	586	80	646	573	87	640
February, . . . . .	586	80	666	573	76	649
March, . . . . .	647	81	728	565	84	649
April, . . . . .	610	82	692	562	81	643
May, . . . . .	613	83	696	569	80	649
June, . . . . .	618	87	706	567	82	649
July, . . . . .	613	92	705	560	84	644
August, . . . . .	607	84	691	562	78	630
September, . . . . .	597	82	679	553	74	627
October, . . . . .	599	82	681	549	82	631
November, . . . . .	620	83	703	542	77	619
December, . . . . .	662	83	645	530	73	603

## TOBACCO, SNUFF, AND CIGARS. [35 Establishments.]

January, . . . . .	716	319	1,035	907	380	1,287
February, . . . . .	746	346	1,092	868	408	1,276
March, . . . . .	792	348	1,140	854	394	1,248
April, . . . . .	814	318	1,132	924	416	1,340
May, . . . . .	868	351	1,239	1,042	432	1,474
June, . . . . .	936	367	1,303	1,008	440	1,448
July, . . . . .	979	407	1,386	1,064	450	1,514
August, . . . . .	1,013	435	1,448	1,014	471	1,485
September, . . . . .	978	428	1,406	1,006	462	1,468
October, . . . . .	964	417	1,401	996	466	1,462
November, . . . . .	963	428	1,391	934	421	1,355
December, . . . . .	940	391	1,331	853	353	1,206

## TOYS AND GAMES (CHILDREN'S). [8 Establishments.]

January, . . . . .	297	47	344	284	51	335
February, . . . . .	317	50	367	316	57	373
March, . . . . .	317	58	375	347	72	419
April, . . . . .	341	66	407	361	77	438
May, . . . . .	351	82	433	384	92	476
June, . . . . .	377	100	477	404	99	503
July, . . . . .	379	112	491	408	104	512
August, . . . . .	388	106	494	452	98	545
September, . . . . .	398	105	503	464	113	577
October, . . . . .	439	115	554	502	127	629
November, . . . . .	444	120	564	503	138	641
December, . . . . .	377	94	471	431	100	531

## TRUNKS AND VALISES. [7 Establishments.]

January, . . . . .	80	1	81	77	2	79
February, . . . . .	82	5	87	97	8	105
March, . . . . .	97	11	108	100	9	109
April, . . . . .	104	9	113	104	9	113
May, . . . . .	106	9	115	109	10	119
June, . . . . .	110	9	119	115	10	125
July, . . . . .	107	9	116	115	10	125
August, . . . . .	111	9	120	115	10	125
September, . . . . .	107	9	116	109	10	119
October, . . . . .	105	9	114	108	9	115
November, . . . . .	97	9	106	100	9	109
December, . . . . .	74	3	77	80	7	87



PERSONS EMPLOYED: BY INDUSTRIES—Continued.  
 AGGREGATES, BY MONTHS—1890, 1891—Continued.  
 WHIPS, LASHES, AND STOCKS. [15 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	297	115	412	285	146	431
February, . . . . .	297	121	418	283	141	424
March, . . . . .	306	121	427	276	138	414
April, . . . . .	308	129	437	271	134	405
May, . . . . .	295	131	426	279	137	416
June, . . . . .	293	133	426	278	141	419
July, . . . . .	290	126	416	277	149	426
August, . . . . .	291	121	412	271	149	420
September, . . . . .	288	127	415	277	148	425
October, . . . . .	290	130	420	278	151	429
November, . . . . .	279	124	403	272	146	418
December, . . . . .	282	117	399	261	133	394

WOODEN GOODS. [149 Establishments.]

January, . . . . .	2,685	58	2,743	2,802	55	2,857
February, . . . . .	2,733	68	2,806	2,846	63	2,909
March, . . . . .	2,749	59	2,808	2,850	66	2,916
April, . . . . .	2,846	54	2,900	2,935	67	3,002
May, . . . . .	2,813	54	2,867	2,981	66	3,047
June, . . . . .	2,869	61	2,930	2,991	65	3,056
July, . . . . .	2,876	68	2,944	2,978	68	3,046
August, . . . . .	2,802	61	2,863	2,981	71	3,052
September, . . . . .	2,898	64	2,962	2,995	70	3,065
October, . . . . .	2,883	70	2,953	3,000	69	3,069
November, . . . . .	2,865	75	2,940	2,948	67	3,015
December, . . . . .	2,805	61	2,866	2,924	57	2,981

WOOLLEN GOODS. [138 Establishments.]

January, . . . . .	10,439	6,285	16,724	10,887	6,562	17,449
February, . . . . .	10,524	6,303	16,827	10,917	6,544	17,461
March, . . . . .	10,585	6,315	16,900	11,068	6,566	17,634
April, . . . . .	10,416	6,270	16,686	11,100	6,629	17,729
May, . . . . .	10,360	6,294	16,654	11,067	6,561	17,628
June, . . . . .	10,417	6,414	16,831	11,103	6,470	17,573
July, . . . . .	10,325	6,251	16,576	11,120	6,407	17,527
August, . . . . .	10,292	6,145	16,437	11,036	6,417	17,453
September, . . . . .	10,473	6,242	16,715	10,991	6,359	17,350
October, . . . . .	10,777	6,359	17,136	10,926	6,434	17,360
November, . . . . .	10,767	6,408	17,175	10,973	6,424	17,397
December, . . . . .	10,723	6,357	17,080	10,754	6,384	17,138

WORSTED GOODS. [21 Establishments.]

January, . . . . .	3,896	4,123	8,018	3,887	4,071	7,958
February, . . . . .	3,997	4,220	8,217	3,967	4,047	8,014
March, . . . . .	4,059	4,236	8,295	3,981	4,016	7,997
April, . . . . .	4,090	4,241	8,331	3,921	3,977	7,898
May, . . . . .	3,908	4,108	8,016	4,022	4,019	8,041
June, . . . . .	3,793	3,977	7,770	4,035	4,048	8,083
July, . . . . .	3,637	3,901	7,538	3,968	4,061	8,029
August, . . . . .	3,694	3,829	7,523	4,010	4,002	8,012
September, . . . . .	3,702	3,955	7,657	4,008	4,045	8,053
October, . . . . .	3,795	4,072	7,867	3,886	4,069	7,955
November, . . . . .	3,856	4,101	7,957	3,962	3,885	7,847
December, . . . . .	4,119	4,263	8,382	3,882	3,775	7,657

PERSONS EMPLOYED: BY INDUSTRIES — Continued.  
 AGGREGATES, BY MONTHS — 1890, 1891 — Concluded.

ALL INDUSTRIES. [3,745 Establishments.]

MONTHS.	1890			1891		
	Males	Females	Total	Males	Females	Total
January, . . . . .	186,079	94,083	280,162	191,939	99,681	291,620
February, . . . . .	188,282	95,984	284,266	192,106	100,704	292,810
March, . . . . .	190,180	97,043	287,223	193,225	101,039	294,264
April, . . . . .	190,565	96,468	287,033	193,594	100,680	294,274
May, . . . . .	191,081	96,761	287,842	195,487	100,571	296,058
June, . . . . .	193,011	96,192	289,203	194,270	98,845	293,115
July, . . . . .	191,812	94,182	285,974	193,575	96,468	290,043
August, . . . . .	193,743	94,244	287,987	194,030	96,112	290,142
September, . . . . .	195,309	96,813	292,122	195,098	97,778	292,876
October, . . . . .	196,912	98,306	295,218	194,557	99,112	293,667
November, . . . . .	194,238	98,049	292,287	193,893	98,760	292,653
December, . . . . .	193,132	97,886	291,018	192,823	98,867	291,690

## THE BUSY SEASON: BY INDUSTRIES.

1890, 1891.

[In this presentation is shown, for 1890 and 1891, the average number of persons employed in each industry, the month or months in which the greatest number of persons was employed in each industry as a whole, the aggregate greatest number of persons employed in the specified month, and the aggregate number of persons employed at *periods of employment of the greatest number*. The figures in the four columns headed "The Busy Season" are based upon the preceding presentation and the month in which the largest number of persons is there shown to have been employed, in any particular industry, has been considered as representing the busy

	INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE NUMBER OF PERSONS EMPLOYED	
			1890	1891
1	Agricultural implements, . . . . .	11	691	677
2	Arms and ammunition, . . . . .	12	1,852	2,096
3	Artisans' tools, . . . . .	56	1,676	1,686
4	Awings, sails, tents, etc., . . . . .	30	155	149
5	Boots and shoes, . . . . .	567	44,068	43,343
6	Boxes (paper and wooden), . . . . .	141	3,228	3,170
7	Brick, tiles, and sewer pipe, . . . . .	45	1,170	1,214
8	Brooms, brushes, and mops, . . . . .	21	762	790
9	Burial cases, caskets, coffins, etc., . . . . .	6	209	222
10	Buttons and dress trimmings, . . . . .	17	1,070	1,197
11	Carpetings, . . . . .	12	4,635	4,672
12	Carriages and wagons, . . . . .	96	2,244	2,299
13	Cement, kaolin, lime, and plaster, . . . . .	4	68	58
14	Chemical preparations (compounded), . . . . .	9	267	279
15	Clocks, watches, and jewelry, . . . . .	77	3,422	3,364
16	Clothing, . . . . .	118	8,178	8,097
17	Cooking, lighting, and heating apparatus, . . . . .	31	2,094	2,227
18	Cordage and twine, . . . . .	25	3,260	3,595
19	Corks, bungs, and taps, . . . . .	4	45	42
20	Cotton goods, . . . . .	157	70,596	71,980
21	Cotton, woollen, and other textiles, . . . . .	3	2,134	2,299
22	Crayons, pencils, crucibles, etc., . . . . .	4	49	43
23	Drugs and medicines, . . . . .	19	377	432
24	Dyestuffs, . . . . .	7	217	218
25	Earthen, plaster, and stone ware, . . . . .	4	223	216
26	Electrical apparatus and appliances, . . . . .	5	2,595	2,660
27	Electroplating, . . . . .	10	77	79
28	Emery and sand paper and cloth, etc., . . . . .	13	280	336
29	Fancy articles, . . . . .	6	244	219
30	Fertilizers, . . . . .	7	62	58
31	Fine arts and taxidermy, . . . . .	2	7	7
32	Fireworks and matches, . . . . .	3	52	71
33	Flax, hemp, jute, and linen goods, . . . . .	8	1,875	1,897
34	Food preparations, . . . . .	284	6,434	7,082

## THE BUSY SEASON: BY INDUSTRIES.

1890, 1891.

season. This table should be read as follows: In Agricultural Implements, the busiest month in the year 1890, on the basis of persons employed, was June, during which month the 11 establishments employed in the aggregate 717 persons, while in March, 1891, the number so employed was 718. The average number of persons employed in the 11 establishments was 691 in 1890 and 677 in 1891. The number of persons employed at periods of employment of greatest number by the 11 establishments was 753 in 1890 and 742 in 1891.]

THE BUSY SEASON				AGGREGATE NUMBER OF PERSONS EMPLOYED AT PERIODS OF EMPLOYMENT OF GREATEST NUMBER		
MONTH IN WHICH THE AGGREGATE GREATEST NUMBER OF PERSONS WAS EMPLOYED		NUMBER OF PERSONS EMPLOYED IN SPECIFIED MONTH				
1890	1891	1890	1891	1890	1891	
June	March	717	718	753	742	1
October	October	1,892	2,180	1,987	2,283	2
May	December	1,717	1,705	1,821	1,807	3
May	October	169	164	224	233	4
August	August	47,430	44,881	51,234	51,550	5
October	April	3,308	3,260	3,677	3,667	6
June	May	1,878	1,911	1,947	2,015	7
March	March	797	812	824	850	8
{ March } { April }	July	213	224	215	224	9
December	April	1,180	1,265	1,332	1,398	10
February	March	4,705	4,790	4,780	4,865	11
June	May	2,516	2,687	2,672	2,878	12
June	May	82	81	87	83	13
{ October } { December }	{ April } { December }	275	291	282	305	14
October	January	3,582	3,616	3,834	3,912	15
October	April	8,770	8,493	9,404	9,454	16
November	October	2,234	2,428	2,318	2,529	17
May	June	3,580	3,884	3,889	4,316	18
April	July	48	48	49	50	19
December	December	71,635	72,557	73,323	75,003	20
July	April	2,220	2,383	2,253	2,412	21
January *	June	50	46	50	46	22
December	October	399	452	430	513	23
October	September	226	225	229	240	24
September	October	233	268	234	269	25
November	December	2,908	3,223	2,916	3,249	26
October	October	87	85	89	91	27
November	June	290	352	322	379	28
December	August	280	229	281	248	29
April	April	99	93	101	95	30
January †	{ November } { December }	8	11	8	11	31
May	May	78	81	81	93	32
August	March	2,011	1,917	2,054	1,953	33
October	October	6,961	7,428	8,401	9,168	34

\* The same number also in February, March, and April.

† The same number also in February and December.

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

## THE BUSY SEASON: BY INDUSTRIES—1890, 1891—Concluded.

	INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE NUMBER OF PERSONS EMPLOYED	
			1890	1891
1	Furniture, . . . . .	120	4,871	4,994
2	Glass, . . . . .	10	458	488
3	Glue, isinglass, and starch, . . . . .	14	386	399
4	Hair work (animal and human), . . . . .	10	213	205
5	Hose: rubber, linen, etc., . . . . .	5	175	233
6	Hosiery and knit goods, . . . . .	40	4,077	5,130
7	Ink, mucilage, and paste, . . . . .	8	115	115
8	Ivory, bone, shell, and horn goods, etc., . . . . .	13	461	504
9	Leather, . . . . .	154	6,137	5,512
10	Liquors and beverages (not spirituous), . . . . .	12	115	126
11	Liquors: malt, distilled, and fermented, . . . . .	49	928	1,009
12	Lumber, . . . . .	25	751	753
13	Machines and machinery, . . . . .	263	15,709	16,120
14	Metals and metallic goods, . . . . .	277	17,096	17,373
15	Mixed textiles, . . . . .	13	833	797
16	Models and patterns, . . . . .	5	41	42
17	Musical instruments and materials, . . . . .	46	2,889	2,692
18	Oils and illuminating fluids, . . . . .	9	173	181
19	Paints, colors, and crude chemicals, . . . . .	16	242	240
20	Paper and paper goods, . . . . .	102	9,574	9,873
21	Perfumes, toilet articles, etc., . . . . .	4	35	36
22	Photographs and photographic materials, . . . . .	11	152	141
23	Polishes and dressing, . . . . .	18	229	218
24	Printing, publishing, and bookbinding, . . . . .	24	1,755	1,796
25	Print works, dye works, and bleacheries, . . . . .	37	5,521	5,240
26	Railroad construction and equipment, . . . . .	14	2,751	2,709
27	Rubber and elastic goods, . . . . .	30	7,615	7,857
28	Scientific instruments and appliances, . . . . .	11	893	991
29	Shipbuilding, . . . . .	42	680	679
30	Silk and silk goods, . . . . .	9	2,268	2,232
31	Sporting and athletic goods, . . . . .	9	323	367
32	Stone, . . . . .	111	3,434	3,435
33	Straw and palm leaf goods, . . . . .	17	2,073	2,094
34	Tallow, candles, soap, and grease, . . . . .	55	688	635
35	Tobacco, snuff, and cigars, . . . . .	35	1,275	1,388
36	Toys and games (children's), . . . . .	8	457	496
37	Trunks and valises, . . . . .	7	107	111
38	Whips, lashes, and stocks, . . . . .	15	418	419
39	Wooden goods, . . . . .	149	2,888	3,012
40	Woollen goods, . . . . .	138	16,816	17,479
41	Worsted goods, . . . . .	21	7,963	7,966
42	ALL INDUSTRIES, . . . . .	3,745	287,900	292,866

## PERSONS EMPLOYED: BY INDUSTRIES — Continued.

## THE BUSY SEASON: BY INDUSTRIES — 1890, 1891 — Concluded.

THE BUSY SEASON				AGGREGATE NUMBER OF PERSONS EMPLOYED AT PERIODS OF EMPLOYMENT OF GREATEST NUMBER		
MONTH IN WHICH THE AGGREGATE GREATEST NUMBER OF PER- SONS WAS EMPLOYED		NUMBER OF PER- SONS EMPLOYED IN SPECI- FIED MONTH				
1890	1891	1890	1891	1890	1891	
November	October	5,145	5,148	5,413	5,452	1
January *	March	486	529	495	537	2
December	March	537	526	581	535	3
June	May	243	209	251	221	4
March	December	203	209	310	276	5
November	November	4,323	5,340	5,051	5,769	6
April †	October	118	119	118	119	7
March	March	515	530	535	563	8
June	March	6,428	5,981	7,421	6,768	9
August	July	154	164	158	167	10
October	October	983	1,110	1,087	1,194	11
October	November	823	893	875	909	12
November	October	16,639	16,297	17,743	18,033	13
December	November	17,093	17,984	18,718	19,398	14
December	April	881	873	930	905	15
September	September	44	44	48	47	16
November	December	2,945	2,758	3,096	2,908	17
{ November December }	{ January February }	208	240	222	244	18
March	May	258	262	264	257	19
December	November	9,871	10,026	10,162	10,528	20
October ‡	{ November December }	37	40	37	40	21
December	December	164	154	165	155	22
September	September	248	234	258	200	23
December	December	1,878	1,896	1,948	2,006	24
October	December	5,686	5,790	5,944	6,071	25
July	January	2,836	2,887	3,055	3,121	26
November	January	8,444	8,225	8,817	9,056	27
December	March	955	1,042	967	1,068	28
May	May	845	874	994	1,072	29
December	November	2,339	2,284	2,504	2,332	30
December	December	365	430	404	497	31
September	September	3,812	3,927	4,252	4,443	32
March	April	3,246	3,317	3,451	3,506	33
March	February §	723	649	774	640	34
August	July	1,448	1,514	1,571	1,639	35
November	November	564	641	577	663	36
August	June	120	125	123	126	37
April	January	437	431	459	457	38
September	October	2,962	3,069	3,296	3,391	39
November	April	17,175	17,729	18,426	18,821	40
December	June	8,382	8,083	8,787	8,460	41
October	May	295,218	296,058	322,288	329,684	42

\* The same number also in February and March.

† The same number also in May and June.

‡ The same number also in November and December.

§ The same number also in March, May, and June.

|| The same number also in July and August.

## SAME NUMBER OF PERSONS EMPLOYED DURING THE YEAR: BY INDUSTRIES.

1890, 1891.

[In this presentation is shown, for 1890 and 1891, the number of establishments reporting the employment of the same number of persons during each month of the year, and the number of persons so employed, designated as to sex.]

	INDUSTRIES.	Whole Number of Establish- ments Considered	1890
			Number of Establishments Reporting the Same Number of Persons Em- ployed During the Entire Year
1	Agricultural implements, . . . . .	11	1
2	Arms and ammunition, . . . . .	12	-
3	Artisans' tools, . . . . .	56	16
4	Awnings, sails, tents, etc., . . . . .	30	5
5	Boots and shoes, . . . . .	587	150
6	Boxes (paper and wooden), . . . . .	141	29
7	Brick, tiles, and sewer pipe, . . . . .	45	3
8	Brooms, brushes, and mops, . . . . .	21	8
9	Burial cases, caskets, coffins, etc., . . . . .	6	4
10	Buttons and dress trimmings, . . . . .	17	1
11	Carpetings, . . . . .	12	-
12	Carriages and wagons, . . . . .	96	18
13	Cement, kaolin, lime, and plaster, . . . . .	4	1
14	Chemical preparations (compounded), . . . . .	9	4
15	Clocks, watches, and jewelry, . . . . .	77	13
16	Clothing, . . . . .	113	30
17	Cooking, lighting, and heating apparatus, . . . . .	31	3
18	Cordage and twine, . . . . .	25	3
19	Corks, bungs, and taps, . . . . .	4	1
20	Cotton goods, . . . . .	157	38
21	Cotton, woollen, and other textiles, . . . . .	3	-
22	Crayons, pencils, crucibles, etc., . . . . .	4	3
23	Drugs and medicines, . . . . .	19	6
24	Dyestuffs, . . . . .	7	2
25	Earthen, plaster, and stone ware, . . . . .	4	1
26	Electrical apparatus and appliances, . . . . .	5	1
27	Electroplating, . . . . .	10	3
28	Emery and sand paper and cloth, etc., . . . . .	13	2
29	Fancy articles, . . . . .	6	2
30	Fertilizers, . . . . .	7	3
31	Fine arts and taxidermy, . . . . .	2	-
32	Fireworks and matches, . . . . .	3	-
33	Flax, hemp, jute, and linen goods, . . . . .	8	1

# SAME NUMBER OF PERSONS EMPLOYED DURING THE YEAR: BY INDUSTRIES.

1890, 1891.

[In this presentation is shown, for 1890 and 1891, the number of establishments reporting the employment of the same number of persons during each month of the year, and the number of persons so employed, designated as to sex.]

1890			1891				
NUMBER OF PERSONS EMPLOYED DURING THE ENTIRE YEAR			Number of Establishments Reporting the Same Number of Persons Employed During the Entire Year	NUMBER OF PERSONS EMPLOYED DURING THE ENTIRE YEAR			
Males	Females	Total		Males	Females	Total	
70	-	70	-	-	-	1	
-	-	-	-	-	-	2	
132	2	134	14	104	2	106	3
23	12	35	5	23	10	33	4
4,747	1,754	6,501	127	4,445	1,785	6,230	5
259	286	545	29	234	190	424	6
86	-	86	2	78	-	78	7
309	157	466	9	306	137	443	8
135	25	160	4	129	25	154	9
11	15	26	2	13	24	37	10
-	-	-	-	-	-	-	11
249	-	249	17	218	3	221	12
3	-	3	2	5	-	5	13
176	-	176	5	28	2	30	14
222	79	301	14	242	63	305	15
887	1,295	2,182	20	498	1,022	1,520	16
59	-	59	3	265	-	265	17
318	66	384	3	328	66	394	18
5	4	9	-	-	-	-	19
8,371	7,867	16,238	83	7,470	7,538	15,008	20
-	-	-	-	-	-	-	21
48	-	48	2	27	-	27	22
23	16	39	6	16	12	28	23
14	-	14	-	-	-	-	24
90	10	100	-	-	-	-	25
43	-	43	1	6	-	6	26
7	-	7	3	16	1	17	27
16	-	16	-	-	-	-	28
18	48	66	2	11	42	53	29
27	-	27	3	16	-	16	30
-	-	-	-	-	-	-	31
-	-	-	-	-	-	-	32
7	2	9	1	307	325	632	33



## PERSONS EMPLOYED: BY INDUSTRIES — Continued.

SAME NUMBER OF PERSONS EMPLOYED: BY INDUSTRIES  
— 1890, 1891 — Concluded.

	INDUSTRIES.	Whole Number of Establish- ments Considered	1890
			Number of Establishments Reporting the Same Number of Persons Em- ployed During the Entire Year
1	Food preparations, . . . . .	264	125
2	Furniture, . . . . .	120	33
3	Glass, . . . . .	10	3
4	Glue, isinglass, and starch, . . . . .	14	-
5	Hair work (animal and human), . . . . .	10	4
6	Hose: rubber, linen, etc., . . . . .	5	1
7	Hosiery and knit goods, . . . . .	40	1
8	Ink, mucilage, and paste, . . . . .	3	6
9	Ivory, bone, shell, and horn goods, etc., . . . . .	13	2
10	Leather, . . . . .	154	29
11	Liquors and beverages (not spirituous), . . . . .	12	1
12	Liquors: malt, distilled, and fermented, . . . . .	49	14
13	Lumber, . . . . .	25	7
14	Machines and machinery, . . . . .	263	63
15	Metals and metallic goods, . . . . .	277	70
16	Mixed textiles, . . . . .	13	2
17	Models and patterns, . . . . .	5	1
18	Musical instruments and materials, . . . . .	46	12
19	Oils and illuminating fluids, . . . . .	9	2
20	Paints, colors, and crude chemicals, . . . . .	16	3
21	Paper and paper goods, . . . . .	102	21
22	Perfumes, toilet articles, etc., . . . . .	4	3
23	Photographs and photographic materials, . . . . .	11	6
24	Polishes and dressing, . . . . .	13	11
25	Printing, publishing, and bookbinding, . . . . .	24	4
26	Print works, dye works, and bleacheries, . . . . .	37	4
27	Railroad construction and equipment, . . . . .	14	-
28	Rubber and elastic goods, . . . . .	30	3
29	Scientific instruments and appliances, . . . . .	11	1
30	Shipbuilding, . . . . .	42	8
31	Silk and silk goods, . . . . .	9	1
32	Sporting and athletic goods, . . . . .	9	2
33	Stone, . . . . .	111	11
34	Straw and palm leaf goods, . . . . .	17	-
35	Tallow, candles, soap, and grease, . . . . .	55	31
36	Tobacco, snuff, and cigars, . . . . .	35	3
37	Toys and games (children's), . . . . .	8	-
38	Trunks and valises, . . . . .	7	2
39	Whips, lashes, and stocks, . . . . .	15	5
40	Wooden goods, . . . . .	149	46
41	Woollen goods, . . . . .	133	25
42	Worsted goods, . . . . .	21	-
43	ALL INDUSTRIES, . . . . .	3,745	913

## PERSONS EMPLOYED: BY INDUSTRIES—Continued.

SAME NUMBER OF PERSONS EMPLOYED: BY INDUSTRIES  
—1890, 1891—Concluded.

1890			1891				
NUMBER OF PERSONS EMPLOYED DURING THE ENTIRE YEAR			Number of Establishments Reporting the Same Number of Persons Employed During the Entire Year	NUMBER OF PERSONS EMPLOYED DURING THE ENTIRE YEAR			
Males	Females	Total		Males	Females	Total	
987	197	1,184	117	718	85	803	1
1,752	58	1,810	31	1,907	41	1,948	2
40	4	44	2	285	25	310	3
-	-	-	1	8	-	8	4
1	10	11	4	4	29	33	5
2	3	5	1	10	16	26	6
8	4	12	3	14	58	72	7
61	44	105	6	60	44	104	8
39	7	46	2	17	4	21	9
752	4	756	29	778	3	781	10
3	-	3	2	5	-	5	11
258	1	259	9	152	-	152	12
37	-	37	4	30	-	30	13
1,049	25	1,074	41	475	4	479	14
1,239	350	1,589	62	1,066	72	1,128	15
117	13	130	2	119	12	131	16
14	-	14	1	16	-	16	17
619	16	635	10	500	16	516	18
16	12	28	1	13	2	15	19
98	4	102	5	31	-	31	20
1,057	512	1,569	18	906	545	1,451	21
6	26	32	2	5	9	14	22
43	27	70	5	35	24	59	23
76	12	88	8	41	2	43	24
21	8	29	6	49	11	60	25
137	24	161	3	23	-	23	26
-	-	-	-	-	-	-	27
105	226	331	3	107	240	347	28
8	8	16	1	2	1	3	29
95	-	95	5	51	-	51	30
5	20	25	1	4	26	30	31
67	4	71	2	66	17	83	32
374	-	374	8	346	-	346	33
-	-	-	-	-	-	-	34
143	67	210	32	120	2	122	35
11	3	14	5	27	24	51	36
-	-	-	-	-	-	-	37
20	1	21	3	24	-	24	38
161	62	223	4	128	37	215	39
828	24	852	37	457	-	457	40
971	604	1,575	25	1,168	776	1,944	41
-	-	-	1	14	26	40	42
27,520	14,013	41,533	810	24,756	13,448	38,204	43

# COMPARISON OF PERSONS EMPLOYED. SAME ESTABLISHMENTS. FOR THE YEARS 1885, 1890.

[In this presentation, the figures given under "Average Number of Persons Employed During the Year" represent the returns made by the same establishments, in each industry, for 1890 and the Census year 1885, the whole number of establishments considered in "All Industries" being 3,817. Comparison is made, as regards the average number of persons employed during the year, between these two years. The relative increase or decrease in 1890 as compared with 1885 is given with its equivalent percentage.]

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE NUMBER OF PERSONS EMPLOYED DURING THE YEAR		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Number	Percent- ages
Agricultural implements, . . . .	11	663	663	+30	+4.52
Arms and ammunition, . . . .	13	1,686	1,838	+152	+9.02
Artisans' tools, . . . .	56	1,473	1,670	+197	+13.37
Awnings, sails, tents, etc., . . . .	34	269	177	-92	-34.20
Boots and shoes, . . . .	528	40,622	44,374	+3,752	+9.24
Boxes (paper and wooden), . . . .	130	2,707	3,156	+449	+16.59
Brick, tiles, and sewer pipe, . . . .	50	2,179	1,624	-555	-25.47
Brooms, brushes, and mops, . . . .	20	305	288	-17	-5.57
Burial cases, caskets, coffins, etc., . . . .	5	166	164	-2	-1.20
Buttons and dress trimmings, . . . .	15	1,137	944	-193	-16.97
Carpetings, . . . .	11	3,897	4,615	+718	+18.42
Carriages and wagons, . . . .	123	3,243	3,117	-126	-3.89
Cement, kaolin, lime, and plaster, . . . .	4	55	69	+14	+25.45
Chemical preparations (compounded), . . . .	12	279	285	+6	+2.15
Clocks, watches, and jewelry, . . . .	86	5,877	6,256	+379	+6.45
Clothing, . . . .	126	8,111	8,784	+673	+8.30
Cooking, lighting, and heating apparatus, . . . .	41	2,454	2,279	-175	-7.13
Cordage and twine, . . . .	24	2,475	3,256	+781	+31.56
Corks, bungs, and taps, . . . .	2	23	26	+3	+13.04
Cotton goods, . . . .	142	63,612	63,090	+4,478	+7.04
Cotton, woollen, and other textiles, . . . .	2	2,798	2,108	-690	-24.66
Crayons, pencils, crucibles, etc., . . . .	3	34	30	-4	-11.76
Drugs and medicines, . . . .	20	550	368	-182	-33.09
Dyestuffs, . . . .	6	158	113	-45	-28.48
Earthen, plaster, and stone ware, . . . .	5	167	292	+125	+74.85
Electrical apparatus and appliances, . . . .	4	291	2,589	+2,298	+78.97
Electroplating, . . . .	10	86	85	-1	-1.16
Emery and sand paper and cloth, etc., . . . .	10	174	208	+34	+19.54
Fancy articles, . . . .	5	87	108	+16	+18.39
Fertilizers, . . . .	6	68	47	-21	-30.88
Fine arts and taxidermy, . . . .	3	5	9	+4	+80.00

## PERSONS EMPLOYED: BY INDUSTRIES — Concluded.

COMPARISON OF PERSONS EMPLOYED. SAME ESTABLISHMENTS.  
FOR THE YEARS 1885, 1890 — Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE NUMBER OF PERSONS EMPLOYED DURING THE YEAR		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Number	Percent- ages
Fireworks and matches, . . . . .	2	55	27	-28	-50.91
Flax, hemp, jute, and linen goods, . . . . .	8	1,727	1,875	+148	+8.57
Food preparations, . . . . .	332	7,258	7,430	+172	+2.37
Furniture, . . . . .	150	4,480	4,435	-45	-1.00
Glass, . . . . .	12	426	557	+131	+30.75
Glue, isinglass, and starch, . . . . .	14	496	436	-60	-12.10
Hair work (animal and human), . . . . .	11	184	217	+33	+17.93
Hose: rubber, linen, etc., . . . . .	8	75	179	+104	+138.67
Hosiery and knit goods, . . . . .	23	3,115	3,384	+269	+8.64
Ink, mucilage, and paste, . . . . .	7	53	28	-25	-47.17
Ivory, bone, shell, and horn goods, etc., . . . . .	17	491	745	+254	+51.73
Leather, . . . . .	169	6,583	6,740	+157	+2.38
Liquors and beverages (not spirituous), . . . . .	12	116	121	+5	+4.31
Liquors: malt, distilled, and fermented, . . . . .	57	1,120	1,047	-73	-6.52
Lumber, . . . . .	24	634	571	-63	-9.94
Machines and machinery, . . . . .	255	12,690	15,511	+2,821	+22.23
Metals and metallic goods, . . . . .	268	14,119	16,537	+2,418	+17.13
Mixed textiles, . . . . .	11	789	815	+26	+3.31
Models and patterns, . . . . .	5	40	41	+1	+2.50
Musical instruments and materials, . . . . .	45	2,736	3,536	+800	+29.24
Oils and illuminating fluids, . . . . .	9	137	173	+36	+26.28
Paints, colors, and crude chemicals, . . . . .	12	192	204	+12	+6.25
Paper and paper goods, . . . . .	95	7,376	8,662	+1,286	+17.43
Perfumes, toilet articles, etc., . . . . .	5	28	37	+9	+32.14
Photographs and photographic materials, . . . . .	11	185	157	-28	-15.14
Polishes and dressing, . . . . .	20	188	236	+48	+25.53
Printing, publishing, and bookbinding, . . . . .	18	1,027	1,015	-12	-1.17
Print works, dye works, and bleacheries, . . . . .	39	5,360	5,511	+151	+2.82
Railroad construction and equipment, . . . . .	7	1,457	2,022	+565	+38.78
Rubber and elastic goods, . . . . .	26	5,600	7,524	+1,924	+34.36
Scientific instruments and appliances, . . . . .	13	629	1,021	+392	+62.32
Shipbuilding, . . . . .	47	1,307	860	-447	-34.20
Silk and silk goods, . . . . .	8	1,833	2,298	+465	+25.37
Sporting and athletic goods, . . . . .	9	328	348	+20	+6.10
Stone, . . . . .	120	4,414	3,501	-913	-20.68
Straw and palm leaf goods, . . . . .	18	3,175	2,613	-562	-17.70
Tallow, candles, soap, and grease, . . . . .	62	665	713	+48	+7.22
Tobacco, snuff, and cigars, . . . . .	38	1,051	1,318	+267	+25.40
Toys and games (children's), . . . . .	9	306	464	+158	+51.63
Trunks and valises, . . . . .	9	128	107	-21	-16.41
Whips, lashes, and stocks, . . . . .	11	357	363	+6	+1.68
Wooden goods, . . . . .	157	3,101	3,197	+96	+3.10
Woollen goods, . . . . .	126	15,400	16,665	+1,265	+8.21
Worsted goods, . . . . .	16	4,937	5,720	+783	+15.86
ALL INDUSTRIES, . . . . .	3,817	262,469	286,618	+24,149	+9.20



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# WAGES PAID: BY INDUSTRIES.

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## WAGES PAID: BY INDUSTRIES.

1890, 1891.

[In this presentation, the figures given under "Total Amount Paid in Wages During the Year" represent the returns made by the same establishments, in each industry, for the years 1890 and 1891, the whole number of establishments considered in "All Industries" being 3,745. Comparison is made, as regards the total amount paid in wages, between these two years. The relative increase or decrease in 1891 as compared with 1890 is given with its equivalent percentage.]

INDUSTRIES.	Number of Estab- lishments Con- sidered	TOTAL AMOUNT PAID IN WAGES DURING THE YEAR		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Agricultural implements, . . . .	11	\$343,441	\$351,149	+\$7,708	+2.24
Arms and ammunition, . . . .	12	1,096,306	1,277,611	+181,306	+16.54
Artisans' tools, . . . .	56	919,421	943,594	+24,173	+2.63
Awnings, sails, tents, etc., . . .	30	94,456	91,937	-2,519	-2.67
Boots and shoes, . . . .	567	22,714,532	21,861,711	-852,821	-3.75
Boxes (paper and wooden), . . .	141	1,256,112	1,228,100	-28,012	-2.23
Brick, tiles, and sewer pipe, . . .	46	519,392	524,435	+5,043	+0.97
Brooms, brushes, and mops, . . .	21	266,196	278,160	+11,964	+4.49
Burial cases, caskets, coffins, etc., .	6	115,453	112,464	-2,989	-2.59
Buttons and dress trimmings, . . .	17	355,838	418,853	+63,015	+17.71
Carpentings, . . . .	12	1,691,949	1,753,899	+61,950	+3.66
Carriages and wagons, . . . .	96	1,280,502	1,358,100	+77,598	+6.06
Cement, kaolin, lime, and plaster, .	4	34,780	28,717	-6,063	-17.43
Chemical preparations (compound- ed), . . . .	9	154,235	165,663	+11,428	+7.41
Clocks, watches, and jewelry, . . .	77	1,914,804	1,929,903	+15,099	+0.79
Clothing, . . . .	113	3,282,572	3,253,144	-29,428	-0.90
Cooking, lighting, and heating ap- paratus, . . . .	31	1,233,719	1,380,410	+146,691	+11.89
Cordage and twine, . . . .	25	1,092,148	1,208,070	+115,922	+10.61
Corks, bungs, and taps, . . . .	4	18,035	13,055	-5,000	-27.72
Cotton goods, . . . .	157	23,634,831	24,738,653	+1,103,772	+4.67
Cotton, woollen, and other textiles,	3	797,731	897,807	+100,076	+12.55
Crayons, pencils, crucibles, etc., .	4	23,988	24,674	+686	+2.86
Drugs and medicines, . . . .	19	159,373	178,222	+18,849	+11.83
Dyestuffs, . . . .	7	112,494	113,635	+1,141	+1.01
Earthen, plaster, and stone ware, .	4	101,540	101,925	+385	+0.38
Electrical apparatus and appliances,	5	1,442,241	1,633,389	+191,148	+13.26
Electroplating, . . . .	10	37,714	40,218	+2,504	+6.64
Emery and sand paper and cloth, etc.,	13	149,188	170,301	+21,113	+14.15
Fancy articles, . . . .	6	63,058	62,901	-157	-0.25
Fertilizers, . . . .	7	40,610	36,383	-4,227	-10.66
Fine arts and taxidermy, . . . .	2	4,531	4,373	-158	-3.49
Fireworks and matches, . . . .	3	15,125	26,467	+11,342	+74.99
Flax, hemp, jute, and linen goods, .	8	589,274	610,311	+21,037	+3.57
Food preparations, . . . .	264	3,036,200	3,435,728	+399,528	+13.16

## WAGES PAID: BY INDUSTRIES — Continued.

## WAGES PAID: BY INDUSTRIES — 1890, 1891 — Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	TOTAL AMOUNT PAID IN WAGES DURING THE YEAR		INCREASE (+), OR DECREASE (—), IN 1891	
		1890	1891	Amounts	Percent- ages
Furniture, . . . . .	120	\$2,341,910	\$2,426,916	+ \$85,006	+3.63
Glass, . . . . .	10	210,657	221,630	+10,973	+5.21
Glue, isinglass, and starch, . .	14	181,444	180,530	—914	—0.50
Hair work (animal and human), .	10	84,440	74,942	—9,498	—11.25
Hose: rubber, linen, etc., . . .	5	82,966	100,330	+17,365	+20.93
Hosiery and knit goods, . . . .	40	1,328,983	1,709,606	+380,623	+28.64
Ink, muclage, and paste, . . . .	8	48,586	47,334	—1,252	—2.48
Ivory, bone, shell, and horn goods, etc.,	13	190,611	228,673	+38,062	+19.97
Leather, . . . . .	154	3,144,285	2,867,027	—277,258	—8.82
Liquors and beverages (not spirit- uous), . . . . .	12	69,467	66,874	—2,593	—3.73
Liquors: malt, distilled, and fer- mented, . . . . .	49	627,656	687,538	+59,882	+9.54
Lumber, . . . . .	25	343,492	366,228	+22,736	+6.62
Machines and machinery, . . . .	263	8,652,828	8,962,322	+309,494	+3.58
Metals and metallic goods, . . .	277	8,548,999	8,829,038	+280,039	+3.28
Mixed textiles, . . . . .	18	317,066	307,521	—9,545	—3.01
Models and patterns, . . . . .	5	23,227	22,762	—465	—2.00
Musical instruments and materials,	46	1,922,514	1,810,180	—112,334	—5.84
Oils and illuminating fluids, . . .	9	89,317	97,537	+8,220	+9.20
Paints, colors, and crude chemicals,	16	120,110	120,842	+732	+0.61
Paper and paper goods, . . . . .	102	4,043,522	4,233,548	+190,026	+4.70
Perfumes, toilet articles, etc., . .	4	13,772	14,992	+1,220	+8.86
Photographs and photographic ma- terials, . . . . .	11	94,900	86,979	—7,921	—8.35
Polishes and dressing, . . . . .	18	108,317	115,078	+6,761	+6.24
Printing, publishing, and bookbind- ing, . . . . .	24	974,086	1,007,994	+33,908	+3.48
Print works, dye works, and bleach- eries, . . . . .	37	2,292,653	2,233,170	—59,483	—2.59
Railroad construction and equip- ment, . . . . .	14	1,649,488	1,599,758	—49,730	—3.01
Rubber and elastic goods, . . . .	30	3,402,245	3,346,236	—56,009	—1.65
Scientific instruments and appliances,	11	385,908	416,582	+30,674	+7.95
Shipbuilding, . . . . .	42	441,545	465,631	+24,086	+5.45
Silk and silk goods, . . . . .	9	769,428	788,349	+18,921	+2.46
Sporting and athletic goods, . . .	9	143,738	161,115	+17,382	+12.09
Stone, . . . . .	111	1,829,456	1,910,273	+80,817	+4.42
Straw and palm leaf goods, . . . .	17	842,460	925,297	+82,837	+9.83
Tallow, candles, soap, and grease, .	55	311,838	301,958	—9,880	—3.17
Tobacco, snuff, and cigars, . . .	35	748,293	803,080	+54,737	+7.31
Toys and games (children's), . . .	8	183,279	197,948	+14,669	+8.00
Trunks and valises, . . . . .	7	57,770	64,488	+6,718	+11.62
Whips, lashes, and stocks, . . . .	15	172,762	186,296	+13,534	+7.83
Wooden goods, . . . . .	149	1,542,285	1,585,717	+43,432	+2.82
Woollen goods, . . . . .	138	6,174,770	6,616,442	+441,672	+7.15
Worsted goods, . . . . .	21	2,927,448	2,973,680	+46,232	+1.58
ALL INDUSTRIES, . . . . .	3,745	\$126,080,303	\$129,416,248	+ \$3,335,945	+2.65



## AVERAGE YEARLY EARNINGS: BY INDUSTRIES.

1890, 1891.

[The average yearly earnings, shown in this presentation, have been obtained by dividing the total amount paid in wages during the years 1890 and 1891 (pages 132 and 133) by the average number of persons employed during the same years (pages 90 to 93 inclusive). The relative increase or decrease in average yearly earnings in 1891 as compared with 1890 is given with its equivalent percentage.]

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE YEARLY EARNINGS		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Agricultural implements, . . .	11	\$497.02	\$518.68	+\$21.66	+4.36
Arms and ammunition, . . .	12	591.96	609.55	+17.59	+2.97
Artisans' tools, . . .	56	548.58	560.00	+11.42	+2.08
Awnings, sails, tents, etc., . . .	30	609.39	617.03	+7.64	+1.25
Boots and shoes, . . .	567	515.44	504.39	-11.05	-2.14
Boxes (paper and wooden), . . .	141	389.13	387.41	-1.72	-0.44
Brick, tiles, and sewer pipe, . . .	45	443.92	431.99	-11.93	-2.69
Brooms, brushes, and mops, . . .	21	349.34	352.10	+2.76	+0.79
Burial cases, caskets, coffins, etc., . . .	6	552.41	506.59	-45.82	-8.29
Buttons and dress trimmings, . . .	17	332.56	349.92	+17.36	+5.22
Carpetings, . . .	12	365.04	375.41	+10.37	+2.84
Carriages and wagons, . . .	96	570.63	590.74	+20.11	+3.52
Cement, kaolin, lime, and plaster, . . .	4	511.47	495.12	-16.35	-3.20
Chemical preparations (compounded), . . .	9	577.66	593.77	+16.11	+2.79
Clocks, watches, and jewelry, . . .	77	559.56	568.62	+9.06	+1.62
Clothing, . . .	113	401.39	401.77	+0.38	+0.09
Cooking, lighting, and heating appara- tus, . . .	31	613.05	619.85	+6.80	+1.11
Cordage and twine, . . .	25	335.01	336.04	+1.03	+0.31
Corks, bungs, and taps, . . .	4	289.67	310.83	+21.16	+7.30
Cotton goods, . . .	157	334.79	343.78	+8.99	+2.69
Cotton, woollen, and other textiles, . . .	3	373.82	390.52	+16.70	+4.47
Crayons, pencils, crucibles, etc., . . .	4	499.55	573.81	+84.26	+17.21
Drugs and medicines, . . .	19	422.74	412.55	-10.19	-2.41
Dyestuffs, . . .	7	518.41	521.26	+2.85	+0.55
Earthen, plaster, and stone ware, . . .	4	457.39	471.88	+14.49	+3.17
Electrical apparatus and appliances, . . .	5	555.78	614.06	+58.28	+10.49
Electroplating, . . .	10	499.79	509.09	+19.30	+3.94
Emery and sand paper and cloth, etc., . . .	13	532.81	506.85	-25.96	-4.87
Fancy articles, . . .	6	278.93	287.22	+8.29	+2.97
Fertilizers, . . .	7	655.00	684.58	+29.58	+4.52
Fine arts and taxidermy, . . .	2	647.29	624.71	-22.58	-3.49
Fireworks and matches, . . .	3	290.87	372.77	+81.90	+28.16

## WAGES PAID: BY INDUSTRIES — Continued.

AVERAGE YEARLY EARNINGS: BY INDUSTRIES — 1890, 1891  
— Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE YEARLY EARNINGS		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Flax, hemp, jute, and linen goods, . . .	8	\$314.28	\$321.72	+\$7.44	+2.37
Food preparations, . . . . .	264	471.90	486.14	+13.24	+2.81
Furniture, . . . . .	120	480.79	485.97	+5.18	+1.08
Glass, . . . . .	10	459.95	454.16	-5.79	-1.26
Glue, isinglass, and starch, . . . .	14	470.06	452.46	-17.60	-3.74
Hair work (animal and human), . . .	10	396.43	365.57	-30.86	-7.78
Hose: rubber, linen, etc., . . . .	5	474.09	430.60	-43.49	-9.17
Hosiery and knit goods, . . . . .	40	325.97	333.26	+7.29	+2.24
Ink, mucilage, and paste, . . . . .	8	422.05	411.00	-10.45	-2.48
Ivory, bone, shell, and horn goods, etc.,	13	413.47	453.72	+40.25	+9.73
Leather, . . . . .	154	512.35	520.14	+7.79	+1.52
Liquors and beverages (not spirituous),	12	604.06	530.75	-73.31	-12.14
Liquors: malt, distilled, and fermented,	49	676.35	681.41	+5.06	+0.75
Lumber, . . . . .	25	457.38	486.36	+28.98	+6.34
Machines and machinery, . . . . .	263	550.82	555.98	+5.16	+0.94
Metals and metallic goods, . . . .	277	500.06	508.20	+8.14	+1.63
Mixed textiles, . . . . .	13	380.63	385.85	+5.22	+1.37
Models and patterns, . . . . .	5	566.51	541.95	-24.56	-4.34
Musical instruments and materials, . .	46	665.46	672.43	+6.97	+1.05
Oils and illuminating fluids, . . . .	9	516.28	538.88	+22.60	+4.38
Paints, colors, and crude chemicals, .	16	496.32	503.51	+7.19	+1.45
Paper and paper goods, . . . . .	102	422.34	428.80	+6.46	+1.53
Perfumes, toilet articles, etc., . . .	4	393.49	416.44	+22.95	+5.83
Photographs and photographic mate- rials, . . . . .	11	624.34	616.87	-7.47	-1.20
Polishes and dressing, . . . . .	18	473.00	527.88	+54.88	+11.60
Printing, publishing, and bookbinding,	24	555.03	561.24	+6.21	+1.12
Print works, dye works, and bleacheries,	37	415.26	426.18	+10.92	+2.63
Railroad construction and equipment, .	14	599.60	590.63	-9.07	-1.51
Rubber and elastic goods, . . . . .	30	446.78	425.89	-20.89	-4.68
Scientific instruments and appliances, .	11	432.15	420.37	-11.78	-2.73
Shipbuilding, . . . . .	42	649.33	685.76	+36.43	+5.61
Silk and silk goods, . . . . .	9	339.25	353.20	+13.95	+4.11
Sporting and athletic goods, . . . .	9	444.99	439.01	-5.98	-1.34
Stone, . . . . .	111	532.75	566.12	+23.37	+4.39
Straw and palm leaf goods, . . . .	17	406.40	441.88	+35.48	+8.73
Tallow, candles, soap, and grease, . .	55	453.25	475.62	+22.27	+4.91
Tobacco, snuff, and cigars, . . . .	35	586.90	578.55	-8.35	-1.42
Toys and games (children's), . . . .	8	401.05	397.49	-3.56	-0.89
Trunks and valises, . . . . .	7	539.91	580.93	+41.02	+7.60
Whips, lashes, and stocks, . . . . .	15	413.31	444.62	+31.31	+7.58
Wooden goods, . . . . .	149	534.03	526.47	-7.56	-1.42
Woollen goods, . . . . .	138	367.20	373.54	+11.34	+3.09
Worsted goods, . . . . .	21	367.63	373.34	+5.71	+1.55
ALL INDUSTRIES, . . . . .	3,745	\$437.93	\$441.90	+\$3.97	+0.91

# COMPARISON OF WAGES PAID. SAME ESTABLISHMENTS. FOR THE YEARS 1885, 1890.

[In this presentation, the figures given under "Total Amount Paid in Wages During the Year" represent the returns made by the same establishments, in each industry, for 1890 and the Census year 1885, the whole number of establishments considered in "All Industries" being 3,817. Comparison is made, as regards the total amount paid in wages, between these two years. The relative increase or decrease in 1890 as compared with 1885 is given with its equivalent percentage.]

INDUSTRIES.	Number of Establishments Considered	TOTAL AMOUNT PAID IN WAGES DURING THE YEAR		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percentages
Agricultural implements, . . .	11	\$270,512	\$343,441	+\$72,929	+26.96
Arms and ammunition, . . .	13	935,915	1,092,454	+156,539	+16.73
Artisans' tools, . . .	56	685,716	914,622	+228,906	+33.38
Awnings, sails, tents, etc., . . .	34	99,338	107,365	+8,027	+8.08
Boots and shoes, . . .	528	17,336,091	22,523,426	+5,192,335	+29.95
Boxes (paper and wooden), . . .	130	922,638	1,232,181	+309,543	+33.55
Brick, tiles, and sewer pipe, . . .	50	545,804	680,857	+135,053	+24.74
Brooms, brushes, and mops, . . .	20	87,758	102,207	+14,449	+16.46
Burial cases, caskets, coffins, etc., . . .	5	82,674	95,453	+12,779	+15.46
Buttons and dress trimmings, . . .	15	327,519	318,162	-9,357	-2.86
Carpetings, . . .	11	1,177,949	1,673,944	+495,995	+42.11
Carriages and wagons, . . .	123	1,576,215	1,823,645	+252,430	+16.01
Cement, kaolin, lime, and plaster, . . .	4	23,176	35,116	+11,940	+51.52
Chemical preparations (compound- ed), . . .	12	126,302	165,080	+38,778	+30.70
Clocks, watches, and jewelry, . . .	86	2,673,007	3,496,085	+823,078	+30.79
Clothing, . . .	126	3,075,514	3,490,524	+415,010	+13.49
Cooking, lighting, and heating appa- ratus, . . .	41	1,229,863	1,397,667	+167,804	+13.64
Cordage and twine, . . .	24	688,727	1,067,622	+378,895	+55.01
Corks, bungs, and taps, . . .	2	8,336	7,460	-876	-10.51
Cotton goods, . . .	142	17,024,681	22,824,756	+5,800,075	+34.07
Cotton, woollen, and other textiles, . . .	2	946,641	784,681	-161,960	-17.11
Crayons, pencils, crucibles, etc., . . .	3	15,012	16,763	+1,751	+11.66
Drugs and medicines, . . .	20	203,914	145,473	-58,441	-28.66
Dyestuffs, . . .	6	69,526	59,447	-10,079	-14.50
Earthen, plaster, and stone ware, . . .	5	91,576	136,540	+44,964	+49.10
Electrical apparatus and appliances, . . .	4	141,335	1,438,705	+1,297,370	+917.94
Electroplating, . . .	10	38,238	41,072	+2,834	+7.41
Emery and sand paper and cloth, etc., . . .	10	80,126	106,544	+26,418	+32.97
Fancy articles, . . .	5	20,246	39,108	+18,862	+93.16
Fertilizers, . . .	6	23,180	20,570	-2,610	-11.26
Fine arts and taxidermy, . . .	3	2,500	6,131	+3,631	+146.24
Fireworks and matches, . . .	2	12,439	7,100	-5,339	-42.92
Flax, hemp, jute, and linen goods, . . .	8	431,050	589,274	+158,224	+36.71
Food preparations, . . .	332	2,969,500	3,450,765	+481,265	+16.21
Furniture, . . .	150	1,993,583	2,190,903	+197,320	+9.90
Glass, . . .	12	236,697	264,403	+27,706	+11.71

## WAGES PAID: BY INDUSTRIES—Continued.

COMPARISON OF WAGES PAID. SAME ESTABLISHMENTS.  
FOR THE YEARS 1885, 1890—Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	TOTAL AMOUNT PAID IN WAGES DURING THE YEAR		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent- ages
Glue, isinglass, and starch, . . .	14	\$153,755	\$172,008	+\$18,253	+12.26
Hair work (animal and human), . .	11	53,055	85,948	+32,893	+62.00
Hose: rubber, linen, etc., . . .	8	32,357	72,811	+40,454	+125.02
Hosiery and knit goods, . . .	23	819,927	1,134,384	+314,457	+38.35
Ink, mucilage, and paste, . . .	7	18,528	12,836	-5,692	-30.72
Ivory, bone, shell, and horn goods, etc., . . . . .	17	193,613	318,088	+124,475	+64.29
Leather, . . . . .	169	2,925,368	3,466,271	+540,903	+18.49
Liquors and beverages (not spirit- uous), . . . . .	12	44,686	69,467	+24,781	+55.46
Liquors: malt, distilled, and fer- mented, . . . . .	57	614,170	701,315	+87,145	+14.19
Lumber, . . . . .	24	244,690	287,323	+42,633	+17.42
Machines and machinery, . . .	255	5,447,416	8,512,631	+3,065,215	+56.27
Metals and metallic goods, . . .	268	6,191,298	8,298,174	+2,106,876	+34.03
Mixed textiles, . . . . .	11	209,373	309,061	+99,688	+47.14
Models and patterns, . . . . .	5	21,788	23,227	+1,439	+6.60
Musical instruments and materials, .	45	1,662,541	2,324,653	+662,112	+39.83
Oils and illuminating fluids, . . .	9	69,330	89,317	+19,987	+28.83
Paints, colors, and crude chemicals, .	12	94,308	98,288	+3,980	+4.22
Paper and paper goods, . . . . .	95	2,878,118	3,630,155	+752,037	+26.13
Perfumes, toilet articles, etc., . . .	5	10,440	15,024	+4,584	+43.91
Photographs and photographic ma- terials, . . . . .	11	86,516	98,956	+12,440	+14.38
Polishes and dressing, . . . . .	20	85,326	112,028	+26,702	+31.30
Printing, publishing, and bookbind- ing, . . . . .	18	488,404	527,553	+39,149	+8.02
Print works, dye works, and bleach- eries, . . . . .	39	1,875,784	2,288,330	+412,546	+21.99
Railroad construction and equip- ment, . . . . .	7	778,889	1,254,371	+475,482	+61.05
Rubber and elastic goods, . . . . .	26	2,125,218	3,359,352	+1,234,134	+58.07
Scientific instruments and appli- ances, . . . . .	13	259,629	434,877	+175,248	+67.50
Shipbuilding, . . . . .	47	428,541	534,826	+106,285	+24.80
Silk and silk goods, . . . . .	8	549,879	775,723	+225,844	+41.07
Sporting and athletic goods, . . .	9	153,891	156,193	+2,302	+1.50
Stone, . . . . .	120	1,928,420	1,885,263	-43,157	-2.24
Straw and palm leaf goods, . . .	18	911,194	1,001,602	+90,408	+9.92
Tallow, candles, soap, and grease, .	62	297,746	322,687	+24,941	+8.38
Tobacco, snuff, and cigars, . . .	38	484,670	740,437	+255,767	+52.77
Toys and games (children's), . . .	9	117,987	186,848	+68,861	+58.36
Trunks and valises, . . . . .	9	52,114	56,870	+4,756	+9.17
Whips, lashes, and stocks, . . .	11	152,829	146,745	-6,084	-3.98
Wooden goods, . . . . .	157	1,350,118	1,648,489	+298,371	+22.10
Woollen goods, . . . . .	126	4,816,398	6,028,816	+1,212,418	+25.17
Worsted goods, . . . . .	16	1,435,843	2,120,828	+684,985	+47.67
ALL INDUSTRIES, . . . . .	3,817	\$96,237,455	\$125,999,921	+\$29,762,466	+30.93

# COMPARISON OF AVERAGE YEARLY EARNINGS. SAME ESTABLISHMENTS. FOR THE YEARS

## 1885, 1890.

[The average yearly earnings, shown in this presentation, have been obtained by dividing the total amount paid in wages during the years 1885 and 1890 (pages 136 and 137) by the average number of persons employed during the same years (pages 128 and 129). The relative increase or decrease in average yearly earnings in 1890 as compared with 1885 is given with its equivalent percentage.]

INDUSTRIES.	Number of Estab-lishments Con-sidered	AVERAGE YEARLY EARNINGS		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percent-ages
Agricultural implements, . . . . .	11	\$408.01	\$495.59	+\$87.58	+21.47
Arms and ammunition, . . . . .	13	555.11	594.37	+39.26	+7.07
Artisans' tools, . . . . .	56	465.52	547.68	+82.16	+17.65
Awnings, sails, tents, etc., . . . . .	34	369.29	606.58	+237.29	+64.26
Boots and shoes, . . . . .	528	426.77	507.69	+80.92	+18.96
Boxes (paper and wooden), . . . . .	130	340.83	390.42	+49.59	+14.55
Brick, tiles, and sewer pipe, . . . . .	50	250.48	419.25	+168.77	+67.38
Brooms, brushes, and mops, . . . . .	20	287.73	354.89	+67.16	+23.34
Burial cases, caskets, coffins, etc., . . . . .	5	498.04	582.03	+83.99	+16.86
Buttons and dress trimmings, . . . . .	15	288.05	337.04	+48.99	+17.01
Carpetings, . . . . .	11	302.27	362.72	+60.45	+20.00
Carriages and wagons, . . . . .	123	486.04	586.67	+100.63	+20.70
Cement, kaolin, lime, and plaster, . . . . .	4	421.38	508.93	+87.55	+20.78
Chemical preparations (compounded), . . . . .	12	452.70	579.23	+126.53	+27.95
Clocks, watches, and jewelry, . . . . .	86	454.83	558.84	+104.01	+22.87
Clothing, . . . . .	126	379.18	397.37	+18.19	+4.80
Cooking, lighting, and heating apparatus, . . . . .	41	501.17	613.28	+112.11	+22.37
Cordage and twine, . . . . .	24	278.27	327.89	+49.62	+17.83
Corks, bungs, and taps, . . . . .	2	362.43	286.92	-75.51	-20.83
Cotton goods, . . . . .	142	267.63	335.21	+67.58	+25.25
Cotton, woollen, and other textiles, . . . . .	2	338.33	372.24	+33.91	+10.02
Crayons, pencils, crucibles, etc., . . . . .	3	441.53	558.77	+117.24	+26.55
Drugs and medicines, . . . . .	20	370.75	396.31	+24.56	+6.62
Dyestuffs, . . . . .	6	440.04	526.08	+86.04	+19.55
Earthen, plaster, and stone ware, . . . . .	5	548.36	467.60	-80.76	-14.73
Electrical apparatus and appliances, . . . . .	4	485.69	555.70	+70.01	+14.41
Electroplating, . . . . .	10	444.63	483.20	+38.57	+8.67
Emery and sand paper and cloth, etc., . . . . .	10	460.49	512.23	+51.74	+11.24
Fancy articles, . . . . .	5	232.71	379.69	+146.98	+63.16
Fertilizers, . . . . .	6	340.88	437.66	+96.78	+28.39

## WAGES PAID: BY INDUSTRIES — Continued.

## COMPARISON OF AVERAGE YEARLY EARNINGS. SAME ESTABLISHMENTS. FOR THE YEARS 1885, 1890 — Concluded.

INDUSTRIES.	Number of Establishments Considered	AVERAGE YEARLY EARNINGS		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percentages
Fine arts and taxidermy, . . . .	3	\$500.00	\$681.22	+\$181.22	+36.24
Fireworks and matches, . . . .	2	226.16	262.96	+36.80	+16.27
Flax, hemp, jute, and linen goods, . . . .	8	249.69	314.28	+64.69	+25.92
Food preparations, . . . . .	332	409.13	464.44	+55.31	+13.52
Furniture, . . . . .	150	445.00	494.00	+49.00	+11.01
Glass, . . . . .	12	555.63	474.69	-80.94	-14.57
Glue, isinglass, and starch, . . . .	14	309.99	395.89	+85.90	+27.71
Hair work (animal and human), . . . .	11	288.34	396.07	+107.73	+37.36
Hose: rubber, linen, etc., . . . .	3	431.43	406.77	-24.66	-5.72
Hosiery and knit goods, . . . . .	23	263.22	335.22	+72.00	+27.35
Ink, mucilage, and paste, . . . .	7	349.58	458.43	+108.85	+31.14
Ivory, bone, shell, and horn goods, etc.,	17	394.32	426.96	+32.64	+8.28
Leather, . . . . .	169	444.38	514.28	+69.90	+15.73
Liquors and beverages (not spirituous),	12	385.22	574.11	+188.89	+49.03
Liquors: malt, distilled, and fermented,	57	548.37	669.83	+121.46	+22.15
Lumber, . . . . .	24	385.95	503.19	+117.24	+30.38
Machines and machinery, . . . . .	255	429.27	548.81	+119.54	+27.85
Metals and metallic goods, . . . .	268	438.51	501.79	+63.28	+14.43
Mixed textiles, . . . . .	11	283.32	377.99	+94.67	+33.41
Models and patterns, . . . . .	5	544.70	566.51	+21.81	+4.00
Musical instruments and materials, . . . .	45	607.65	657.42	+49.77	+8.19
Oils and illuminating fluids, . . . .	9	506.06	516.28	+10.22	+2.02
Paints, colors, and crude chemicals, . . . .	12	491.19	481.80	-9.39	-1.91
Paper and paper goods, . . . . .	95	366.43	419.09	+52.66	+14.66
Perfumes, toilet articles, etc., . . . .	5	372.86	406.06	+33.19	+8.90
Photographs and photographic materials,	11	467.65	630.29	+162.64	+34.78
Pollaxes and dressing, . . . . .	20	453.86	474.69	+20.83	+4.59
Printing, publishing, and bookbinding, . . . .	18	475.56	519.76	+44.20	+9.29
Print works, dye works, and bleacheries,	39	349.96	415.23	+65.27	+18.65
Railroad construction and equipment, . . . .	7	534.58	620.36	+85.78	+16.05
Rubber and elastic goods, . . . . .	26	379.50	446.48	+66.98	+17.65
Scientific instruments and appliances, . . . .	13	412.76	425.93	+13.17	+3.19
Shipbuilding, . . . . .	47	327.88	621.89	+294.01	+89.67
Silk and silk goods, . . . . .	8	299.99	337.56	+37.57	+12.52
Sporting and athletic goods, . . . . .	9	469.18	448.83	-20.35	-4.34
Stone, . . . . .	120	436.89	538.49	+101.60	+23.26
Straw and palm leaf goods, . . . . .	18	286.99	383.31	+96.32	+33.56
Tallow, candles, soap, and grease, . . . .	62	447.74	452.58	+4.84	+1.08
Tobacco, snuff, and cigars, . . . . .	38	461.15	561.79	+100.64	+21.82
Toys and games (children's), . . . .	9	385.58	402.69	+17.11	+4.44
Trunks and valises, . . . . .	9	407.14	526.82	+119.68	+29.39
Whips, lashes, and stocks, . . . . .	11	428.09	404.26	-23.83	-5.57
Wooden goods, . . . . .	157	435.38	515.64	+80.26	+18.43
Woollen goods, . . . . .	126	312.75	361.77	+49.02	+15.67
Worsted goods, . . . . .	16	290.83	370.09	+79.26	+27.46
ALL INDUSTRIES, . . . . .	3,817	\$366.66	\$439.61	+\$72.95	+19.90

## CLASSIFIED WEEKLY WAGES: BY INDUSTRIES.

1890, 1891.

[In this presentation is shown, for 1890 and 1891, a classification of weekly wage, ranging from under \$5 per week to \$20 and over, and the number of males and females receiving such wage. The returns were made by manufacturers to cover the week during which the largest number of persons was employed.]

### AGRICULTURAL IMPLEMENTS. [11 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	9	-	9	7	-	7
\$5 but under \$6, . . . . .	17	-	17	13	-	13
\$6 but under \$7, . . . . .	14	-	14	12	-	12
\$7 but under \$8, . . . . .	90	-	90	75	-	75
\$8 but under \$9, . . . . .	85	-	85	98	-	98
\$9 but under \$10, . . . . .	182	-	182	176	-	176
\$10 but under \$12, . . . . .	117	-	117	107	-	107
\$12 but under \$15, . . . . .	121	-	121	148	-	148
\$15 but under \$20, . . . . .	78	-	78	74	-	74
\$20 and over, . . . . .	17	-	17	18	-	18
TOTALS, . . . . .	730	-	730	728	-	728

### ARMS AND AMMUNITION. [12 Establishments.]

Under \$5, . . . . .	130	21	151	136	23	159
\$5 but under \$6, . . . . .	71	20	91	47	19	66
\$6 but under \$7, . . . . .	82	21	103	111	25	136
\$7 but under \$8, . . . . .	63	21	84	59	23	82
\$8 but under \$9, . . . . .	64	51	115	68	53	121
\$9 but under \$10, . . . . .	142	30	172	215	80	245
\$10 but under \$12, . . . . .	177	11	188	229	10	239
\$12 but under \$15, . . . . .	280	2	282	342	3	345
\$15 but under \$20, . . . . .	613	-	613	694	1	695
\$20 and over, . . . . .	134	-	134	154	-	154
TOTALS, . . . . .	1,756	177	1,933	2,055	187	2,242

### ARTISANS' TOOLS. [56 Establishments.]

Under \$5, . . . . .	108	16	124	91	14	105
\$5 but under \$6, . . . . .	45	10	55	64	11	75
\$6 but under \$7, . . . . .	85	19	104	79	18	97
\$7 but under \$8, . . . . .	123	8	131	115	10	125
\$8 but under \$9, . . . . .	91	8	99	107	6	113
\$9 but under \$10, . . . . .	197	2	199	209	5	214
\$10 but under \$12, . . . . .	279	1	280	257	1	258
\$12 but under \$15, . . . . .	364	-	364	374	-	374
\$15 but under \$20, . . . . .	295	-	295	286	1	287
\$20 and over, . . . . .	128	-	128	113	-	113
TOTALS, . . . . .	1,715	64	1,779	1,695	66	1,761

## WAGES PAID: BY INDUSTRIES — Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES — 1890, 1891  
— Continued.

## AWNINGS, SAILS, TENTS, ETC. [30 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	3	-	3	6	-	6
\$5 but under \$6, . . . . .	8	5	8	2	2	4
\$6 but under \$7, . . . . .	2	11	13	5	6	11
\$7 but under \$8, . . . . .	2	4	6	3	6	9
\$8 but under \$9, . . . . .	1	19	20	2	19	21
\$9 but under \$10, . . . . .	2	1	3	2	1	3
\$10 but under \$12, . . . . .	3	1	4	6	2	8
\$12 but under \$15, . . . . .	20	-	20	34	-	34
\$15 but under \$20, . . . . .	127	-	127	143	-	143
\$20 and over, . . . . .	23	-	23	-	-	-
TOTALS, . . . . .	186	41	227	203	36	239

## BOOTS AND SHOES. [567 Establishments.]

Under \$5, . . . . .	1,695	2,213	3,908	1,629	2,362	3,991
\$5 but under \$6, . . . . .	1,101	1,347	2,448	1,065	1,361	2,426
\$6 but under \$7, . . . . .	1,691	1,693	3,384	1,659	1,925	3,584
\$7 but under \$8, . . . . .	1,744	1,684	3,428	1,694	1,847	3,541
\$8 but under \$9, . . . . .	1,874	1,587	3,461	2,015	1,574	3,589
\$9 but under \$10, . . . . .	2,959	1,745	4,704	3,032	1,757	4,789
\$10 but under \$12, . . . . .	5,188	1,950	7,148	4,862	1,911	6,773
\$12 but under \$15, . . . . .	8,799	1,763	10,562	8,480	1,611	10,091
\$15 but under \$20, . . . . .	7,909	582	8,491	7,697	621	8,318
\$20 and over, . . . . .	2,646	60	2,706	2,438	59	2,497
TOTALS, . . . . .	35,616	14,624	50,240	34,571	15,028	49,599

## BOXES (PAPER AND WOODEN). [141 Establishments.]

Under \$5, . . . . .	99	383	482	100	348	448
\$5 but under \$6, . . . . .	47	210	257	53	251	304
\$6 but under \$7, . . . . .	115	314	429	106	327	433
\$7 but under \$8, . . . . .	198	270	468	198	275	473
\$8 but under \$9, . . . . .	199	164	363	178	128	306
\$9 but under \$10, . . . . .	400	107	507	449	80	529
\$10 but under \$12, . . . . .	388	66	454	375	65	440
\$12 but under \$15, . . . . .	420	24	444	443	15	458
\$15 but under \$20, . . . . .	223	7	230	191	5	196
\$20 and over, . . . . .	9	-	9	20	-	20
TOTALS, . . . . .	2,098	1,545	3,643	2,113	1,494	3,607

## BRICK, TILES, AND SEWER PIPE. [45 Establishments.]

Under \$5, . . . . .	21	8	29	28	8	36
\$5 but under \$6, . . . . .	9	2	11	43	2	45
\$6 but under \$7, . . . . .	57	-	57	58	-	58
\$7 but under \$8, . . . . .	162	-	162	197	-	197
\$8 but under \$9, . . . . .	202	-	202	288	-	288
\$9 but under \$10, . . . . .	576	-	576	555	-	555
\$10 but under \$12, . . . . .	560	-	560	456	-	456
\$12 but under \$15, . . . . .	198	-	198	192	1	193
\$15 but under \$20, . . . . .	90	-	90	94	-	94
\$20 and over, . . . . .	42	-	42	37	-	37
TOTALS, . . . . .	1,917	10	1,927	1,948	11	1,959



## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## BROOMS, BRUSHES, AND MOPS. [21 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	84	175	259	87	206	293
\$5 but under \$6, . . . .	88	90	128	32	83	115
\$6 but under \$7, . . . .	43	33	76	46	42	88
\$7 but under \$8, . . . .	21	24	45	29	15	44
\$8 but under \$9, . . . .	17	6	23	17	7	24
\$9 but under \$10, . . . .	32	5	37	35	2	37
\$10 but under \$12, . . . .	44	1	45	38	1	39
\$12 but under \$15, . . . .	100	-	100	98	1	99
\$15 but under \$20, . . . .	70	-	70	74	-	74
\$20 and over, . . . . .	47	-	47	51	-	51
TOTALS, . . . . .	496	334	830	507	357	864

## BURIAL CASES, CASKETS, COFFINS, ETC. [6 Establishments.]

Under \$5, . . . . .	2	4	6	2	3	5
\$5 but under \$6, . . . .	3	2	5	-	3	3
\$6 but under \$7, . . . .	4	19	23	4	11	15
\$7 but under \$8, . . . .	16	-	16	14	-	14
\$8 but under \$9, . . . .	7	3	10	8	7	15
\$9 but under \$10, . . . .	11	8	19	15	8	23
\$10 but under \$12, . . . .	18	2	20	19	1	20
\$12 but under \$15, . . . .	58	1	59	67	1	68
\$15 but under \$20, . . . .	54	-	54	50	-	50
\$20 and over, . . . . .	5	-	5	5	-	5
TOTALS, . . . . .	178	39	217	184	34	218

## BUTTONS AND DRESS TRIMMINGS. [17 Establishments.]

Under \$5, . . . . .	49	453	502	52	419	471
\$5 but under \$6, . . . .	27	255	282	30	258	288
\$6 but under \$7, . . . .	17	144	161	26	167	193
\$7 but under \$8, . . . .	42	72	114	43	83	126
\$8 but under \$9, . . . .	22	38	60	27	34	61
\$9 but under \$10, . . . .	43	12	55	46	20	66
\$10 but under \$12, . . . .	45	12	57	53	16	69
\$12 but under \$15, . . . .	63	1	64	71	-	71
\$15 but under \$20, . . . .	36	-	36	49	-	49
\$20 and over, . . . . .	21	-	21	21	-	21
TOTALS, . . . . .	365	987	1,352	418	997	1,415

## CARPETINGS. [12 Establishments.]

Under \$5, . . . . .	411	845	1,256	473	837	1,310
\$5 but under \$6, . . . .	154	506	660	168	551	719
\$6 but under \$7, . . . .	328	310	638	280	361	641
\$7 but under \$8, . . . .	137	342	479	162	293	455
\$8 but under \$9, . . . .	240	316	556	254	184	438
\$9 but under \$10, . . . .	254	125	379	277	189	466
\$10 but under \$12, . . . .	195	119	314	207	189	396
\$12 but under \$15, . . . .	287	20	307	239	13	252
\$15 but under \$20, . . . .	128	3	131	121	1	122
\$20 and over, . . . . .	39	-	39	39	-	39
TOTALS, . . . . .	2,173	2,586	4,759	2,220	2,618	4,838

## WAGES PAID: BY INDUSTRIES — Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES — 1890, 1891  
— Continued.

## CARRIAGES AND WAGONS. [96 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	148	1	149	68	1	69
\$5 but under \$6, . . . . .	67	1	68	65	1	66
\$6 but under \$7, . . . . .	68	8	76	80	8	88
\$7 but under \$8, . . . . .	86	10	96	126	10	136
\$8 but under \$9, . . . . .	88	8	96	159	5	164
\$9 but under \$10, . . . . .	267	11	278	299	7	306
\$10 but under \$12, . . . . .	437	1	438	512	2	514
\$12 but under \$15, . . . . .	671	—	671	723	—	723
\$15 but under \$20, . . . . .	589	—	589	633	—	633
\$20 and over, . . . . .	121	—	121	107	—	107
TOTALS, . . . . .	2,542	40	2,582	2,772	34	2,806

## CEMENT, KAOLIN, LIME, AND PLASTER. [4 Establishments.]

Under \$5, . . . . .	—	—	—	—	—	—
\$5 but under \$6, . . . . .	—	—	—	—	—	—
\$6 but under \$7, . . . . .	—	—	—	—	—	—
\$7 but under \$8, . . . . .	—	—	—	—	—	—
\$8 but under \$9, . . . . .	—	—	—	—	—	—
\$9 but under \$10, . . . . .	68	—	68	65	—	65
\$10 but under \$12, . . . . .	4	—	4	3	—	3
\$12 but under \$15, . . . . .	11	—	11	11	—	11
\$15 but under \$20, . . . . .	6	—	6	6	—	6
\$20 and over, . . . . .	—	—	—	—	—	—
TOTALS, . . . . .	89	—	89	85	—	85

## CHEMICAL PREPARATIONS (COMPOUNDED). [9 Establishments.]

Under \$5, . . . . .	2	—	2	2	1	3
\$5 but under \$6, . . . . .	3	—	3	2	—	2
\$6 but under \$7, . . . . .	3	1	4	4	—	4
\$7 but under \$8, . . . . .	1	—	1	3	1	4
\$8 but under \$9, . . . . .	14	1	15	7	—	7
\$9 but under \$10, . . . . .	95	—	95	121	—	121
\$10 but under \$12, . . . . .	57	—	57	54	1	55
\$12 but under \$15, . . . . .	75	—	75	83	—	83
\$15 but under \$20, . . . . .	11	—	11	21	—	21
\$20 and over, . . . . .	14	—	14	4	—	4
TOTALS, . . . . .	275	2	277	301	3	304

## CLOCKS, WATCHES, AND JEWELRY. [77 Establishments.]

Under \$5, . . . . .	112	141	253	92	137	229
\$5 but under \$6, . . . . .	109	201	310	100	202	302
\$6 but under \$7, . . . . .	108	167	275	106	117	223
\$7 but under \$8, . . . . .	151	172	323	128	180	308
\$8 but under \$9, . . . . .	156	138	294	148	136	284
\$9 but under \$10, . . . . .	136	94	230	157	115	272
\$10 but under \$12, . . . . .	365	45	410	405	46	451
\$12 but under \$15, . . . . .	507	38	545	558	28	586
\$15 but under \$20, . . . . .	694	13	707	704	4	708
\$20 and over, . . . . .	376	8	379	362	1	363
TOTALS, . . . . .	2,714	1,012	3,726	2,700	966	3,726

## WAGES PAID: BY INDUSTRIES — Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES — 1890, 1891  
— Continued.

## CLOTHING. [113 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	167	1,062	1,229	130	1,344	1,474
\$5 but under \$6, . . . .	119	783	902	92	1,031	1,123
\$6 but under \$7, . . . .	180	1,220	1,400	169	1,097	1,266
\$7 but under \$8, . . . .	166	1,232	1,398	150	1,231	1,381
\$8 but under \$9, . . . .	175	752	927	165	738	903
\$9 but under \$10, . . . .	235	480	715	237	426	663
\$10 but under \$12, . . . .	321	435	756	324	282	606
\$12 but under \$15, . . . .	454	135	589	519	141	660
\$15 but under \$20, . . . .	571	31	602	590	55	645
\$20 and over, . . . . .	412	12	424	387	20	407
TOTALS, . . . . .	2,830	6,142	8,972	2,743	6,365	9,108

## COOKING, LIGHTING, AND HEATING APPARATUS. [31 Establishments.]

Under \$5, . . . . .	57	4	61	83	5	88
\$5 but under \$6, . . . .	35	9	44	46	3	49
\$6 but under \$7, . . . .	66	6	72	83	9	92
\$7 but under \$8, . . . .	98	6	104	117	3	120
\$8 but under \$9, . . . .	126	1	127	117	2	119
\$9 but under \$10, . . . .	257	8	265	365	2	367
\$10 but under \$12, . . . .	327	2	329	301	4	305
\$12 but under \$15, . . . .	478	—	478	487	—	487
\$15 but under \$20, . . . .	493	—	493	498	1	499
\$20 and over, . . . . .	303	—	303	323	—	323
TOTALS, . . . . .	2,240	31	2,271	2,420	29	2,449

## CORDAGE AND TWINE. [25 Establishments.]

Under \$5, . . . . .	224	793	1,017	201	713	914
\$5 but under \$6, . . . .	243	578	821	234	693	927
\$6 but under \$7, . . . .	244	337	581	308	317	625
\$7 but under \$8, . . . .	164	68	232	247	99	346
\$8 but under \$9, . . . .	341	27	368	470	27	497
\$9 but under \$10, . . . .	870	15	885	513	11	524
\$10 but under \$12, . . . .	132	—	132	164	—	164
\$12 but under \$15, . . . .	171	—	171	160	—	160
\$15 but under \$20, . . . .	115	—	115	133	—	133
\$20 and over, . . . . .	32	—	32	29	—	29
TOTALS, . . . . .	2,036	1,818	3,854	2,459	1,860	4,319

## CORKS, BUNGS, AND TAPS. [4 Establishments.]

Under \$5, . . . . .	10	11	21	11	9	20
\$5 but under \$6, . . . .	1	1	2	7	1	8
\$6 but under \$7, . . . .	4	—	4	4	—	4
\$7 but under \$8, . . . .	3	1	4	1	—	1
\$8 but under \$9, . . . .	2	—	2	4	—	4
\$9 but under \$10, . . . .	7	—	7	4	—	4
\$10 but under \$12, . . . .	3	—	3	4	—	4
\$12 but under \$15, . . . .	4	—	4	3	—	3
\$15 but under \$20, . . . .	2	—	2	2	—	2
\$20 and over, . . . . .	—	—	—	—	—	—
TOTALS, . . . . .	36	13	49	40	10	50

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## COTTON GOODS. [157 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . .	6,992	12,311	19,303	7,092	12,345	19,437
\$5 but under \$6, . . . .	3,344	7,917	11,261	3,495	7,966	11,461
\$6 but under \$7, . . . .	6,005	7,980	13,985	6,089	7,944	14,033
\$7 but under \$8, . . . .	3,964	5,003	8,967	3,935	5,416	9,351
\$8 but under \$9, . . . .	3,239	2,789	6,028	3,624	3,695	7,319
\$9 but under \$10, . . . .	3,596	1,694	5,590	3,849	1,804	5,653
\$10 but under \$12, . . . .	3,690	628	4,318	3,734	694	4,428
\$12 but under \$15, . . . .	2,301	59	2,360	2,370	49	2,419
\$15 but under \$20, . . . .	868	—	868	903	1	904
\$20 and over, . . . .	475	—	475	537	—	537
TOTALS, . . . .	34,774	38,381	73,155	35,628	39,914	75,542

## COTTON, WOOLLEN, AND OTHER TEXTILES. [3 Establishments.]

Under \$5, . . . .	86	216	302	78	129	207
\$5 but under \$6, . . . .	32	285	317	51	301	352
\$6 but under \$7, . . . .	169	343	512	160	356	516
\$7 but under \$8, . . . .	270	266	536	329	207	536
\$8 but under \$9, . . . .	79	106	185	106	202	308
\$9 but under \$10, . . . .	111	15	126	115	81	196
\$10 but under \$12, . . . .	81	9	90	109	6	115
\$12 but under \$15, . . . .	145	—	145	145	1	146
\$15 but under \$20, . . . .	44	—	44	30	—	30
\$20 and over, . . . .	20	—	20	23	—	23
TOTALS, . . . .	1,037	1,240	2,277	1,146	1,283	2,429

## CRAYONS, PENCILS, CRUCIBLES, ETC. [4 Establishments.]

Under \$5, . . . .	8	—	8	2	—	2
\$5 but under \$6, . . . .	—	—	—	—	—	—
\$6 but under \$7, . . . .	5	—	5	5	—	5
\$7 but under \$8, . . . .	3	—	3	—	—	—
\$8 but under \$9, . . . .	—	—	—	—	—	—
\$9 but under \$10, . . . .	4	—	4	14	—	14
\$10 but under \$12, . . . .	6	—	6	5	—	5
\$12 but under \$15, . . . .	22	—	22	6	—	6
\$15 but under \$20, . . . .	2	—	2	5	—	5
\$20 and over, . . . .	—	—	—	—	—	—
TOTALS, . . . .	50	—	50	37	—	37

## DRUGS AND MEDICINES. [19 Establishments.]

Under \$5, . . . .	36	30	66	30	41	71
\$5 but under \$6, . . . .	7	44	51	6	69	75
\$6 but under \$7, . . . .	12	69	81	12	72	84
\$7 but under \$8, . . . .	14	33	47	21	32	53
\$8 but under \$9, . . . .	26	4	30	19	22	41
\$9 but under \$10, . . . .	33	3	36	56	5	61
\$10 but under \$12, . . . .	32	4	36	32	5	37
\$12 but under \$15, . . . .	37	5	42	39	4	43
\$15 but under \$20, . . . .	39	1	40	36	2	38
\$20 and over, . . . .	9	—	9	8	—	8
TOTALS, . . . .	245	193	438	259	252	511

## WAGES PAID: BY INDUSTRIES—Continued

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
— Continued.

## DYESTUFFS. [7 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . .	1	2	3	3	-	3
\$5 but under \$6, . . . .	1	1	2	2	5	7
\$6 but under \$7, . . . .	4	3	7	3	6	9
\$7 but under \$8, . . . .	13	3	16	20	2	22
\$8 but under \$9, . . . .	1	1	2	6	1	7
\$9 but under \$10, . . . .	63	-	63	71	-	71
\$10 but under \$12, . . . .	92	-	92	85	-	85
\$12 but under \$15, . . . .	37	-	37	26	-	26
\$15 but under \$20, . . . .	5	-	5	10	-	10
\$20 and over, . . . .	1	-	1	1	-	1
TOTALS, . . . .	218	10	228	227	14	241

## EARTHEN, PLASTER, AND STONE WARE. [4 Establishments.]

Under \$5, . . . .	18	22	40	7	32	39
\$5 but under \$6, . . . .	4	5	9	9	-	9
\$6 but under \$7, . . . .	4	-	4	11	-	11
\$7 but under \$8, . . . .	12	-	12	17	-	17
\$8 but under \$9, . . . .	69	-	69	26	-	26
\$9 but under \$10, . . . .	18	-	18	29	-	29
\$10 but under \$12, . . . .	23	-	23	61	-	61
\$12 but under \$15, . . . .	18	-	18	36	-	36
\$15 but under \$20, . . . .	26	-	26	25	-	25
\$20 and over, . . . .	10	-	10	10	-	10
TOTALS, . . . .	207	27	234	231	32	263

## ELECTRICAL APPARATUS AND APPLIANCES. [5 Establishments.]

Under \$5, . . . .	164	49	213	196	87	283
\$5 but under \$6, . . . .	109	44	153	116	40	156
\$6 but under \$7, . . . .	76	55	131	114	40	154
\$7 but under \$8, . . . .	210	56	266	187	45	232
\$8 but under \$9, . . . .	241	49	290	221	33	254
\$9 but under \$10, . . . .	126	43	169	182	52	234
\$10 but under \$12, . . . .	346	20	366	398	17	415
\$12 but under \$15, . . . .	549	-	549	545	5	550
\$15 but under \$20, . . . .	546	-	546	699	-	699
\$20 and over, . . . .	184	-	184	218	-	218
TOTALS, . . . .	2,551	316	2,867	2,876	319	3,195

## ELECTROPLATING. [10 Establishments.]

Under \$5, . . . .	4	1	5	2	-	2
\$5 but under \$6, . . . .	1	1	2	3	1	4
\$6 but under \$7, . . . .	8	1	9	4	3	7
\$7 but under \$8, . . . .	4	-	4	3	-	3
\$8 but under \$9, . . . .	4	1	5	5	-	5
\$9 but under \$10, . . . .	5	-	5	16	-	16
\$10 but under \$12, . . . .	16	-	16	16	-	16
\$12 but under \$15, . . . .	23	-	23	20	-	20
\$15 but under \$20, . . . .	14	-	14	16	-	16
\$20 and over, . . . .	3	-	3	2	-	2
TOTALS, . . . .	82	4	86	87	4	91

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## EMERY AND SAND PAPER AND CLOTH, ETC. [13 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	3	-	3	9	-	9
\$5 but under \$6, . . . . .	5	8	13	5	8	13
\$6 but under \$7, . . . . .	12	1	13	9	1	10
\$7 but under \$8, . . . . .	9	-	9	9	-	9
\$8 but under \$9, . . . . .	13	-	13	14	-	14
\$9 but under \$10, . . . . .	68	-	68	101	-	101
\$10 but under \$12, . . . . .	84	1	85	103	1	104
\$12 but under \$15, . . . . .	63	-	63	47	-	47
\$15 but under \$20, . . . . .	27	-	27	31	-	31
\$20 and over, . . . . .	7	-	7	14	-	14
TOTALS, . . . . .	291	10	301	342	10	352

## FANCY ARTICLES. [6 Establishments.]

Under \$5, . . . . .	10	125	135	6	37	93
\$5 but under \$6, . . . . .	3	42	45	2	42	44
\$6 but under \$7, . . . . .	3	28	31	1	39	40
\$7 but under \$8, . . . . .	2	16	18	2	11	13
\$8 but under \$9, . . . . .	3	7	10	3	5	8
\$9 but under \$10, . . . . .	6	2	8	2	3	5
\$10 but under \$12, . . . . .	4	1	5	7	1	8
\$12 but under \$15, . . . . .	7	-	7	5	-	5
\$15 but under \$20, . . . . .	15	-	15	10	-	10
\$20 and over, . . . . .	4	-	4	4	-	4
TOTALS, . . . . .	57	221	278	42	188	230

## FERTILIZERS. [7 Establishments.]

Under \$5, . . . . .	-	-	-	-	-	-
\$5 but under \$6, . . . . .	-	-	-	-	-	-
\$6 but under \$7, . . . . .	3	-	3	2	-	2
\$7 but under \$8, . . . . .	3	-	3	2	-	2
\$8 but under \$9, . . . . .	21	-	21	21	-	21
\$9 but under \$10, . . . . .	40	-	40	41	-	41
\$10 but under \$12, . . . . .	18	-	18	9	-	9
\$12 but under \$15, . . . . .	9	-	9	13	-	13
\$15 but under \$20, . . . . .	5	-	5	3	-	3
\$20 and over, . . . . .	1	-	1	1	-	1
TOTALS, . . . . .	100	-	100	92	-	92

## FINE ARTS AND TAXIDERMV. [2 Establishments.]

Under \$5, . . . . .	1	-	1	2	1	3
\$5 but under \$6, . . . . .	-	-	-	-	-	-
\$6 but under \$7, . . . . .	-	-	-	1	-	1
\$7 but under \$8, . . . . .	-	-	-	1	-	1
\$8 but under \$9, . . . . .	1	-	1	2	-	2
\$9 but under \$10, . . . . .	-	-	-	-	-	-
\$10 but under \$12, . . . . .	-	-	-	-	-	-
\$12 but under \$15, . . . . .	3	-	3	-	-	-
\$15 but under \$20, . . . . .	3	-	3	4	-	4
\$20 and over, . . . . .	-	-	-	-	-	-
TOTALS, . . . . .	8	-	8	9	2	11

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## FIREWORKS AND MATCHES. [3 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	24	10	34	—	1	1
\$5 but under \$6, . . . .	6	10	16	24	9	33
\$6 but under \$7, . . . .	7	2	9	7	13	20
\$7 but under \$8, . . . .	—	—	—	—	—	—
\$8 but under \$9, . . . .	1	—	1	2	—	2
\$9 but under \$10, . . . .	8	1	9	16	1	17
\$10 but under \$12, . . . .	2	—	2	8	—	8
\$12 but under \$15, . . . .	8	—	8	8	—	8
\$15 but under \$20, . . . .	2	—	2	6	—	6
\$20 and over, . . . . .	1	—	1	1	—	1
TOTALS, . . . . .	58	23	81	71	24	95

## FLAX, HEMP, JUTE, AND LINEN GOODS. [8 Establishments.]

Under \$5, . . . . .	245	407	652	204	424	628
\$5 but under \$6, . . . .	107	271	378	95	288	383
\$6 but under \$7, . . . .	155	184	339	147	170	317
\$7 but under \$8, . . . .	190	64	254	114	57	171
\$8 but under \$9, . . . .	82	7	89	67	25	92
\$9 but under \$10, . . . .	149	—	149	125	—	125
\$10 but under \$12, . . . .	83	—	83	105	—	105
\$12 but under \$15, . . . .	97	—	97	87	—	87
\$15 but under \$20, . . . .	26	—	26	88	—	88
\$20 and over, . . . . .	2	—	2	2	—	2
TOTALS, . . . . .	1,136	933	2,069	984	964	1,948

## FOOD PREPARATIONS. [264 Establishments.]

Under \$5, . . . . .	*209	1,084	*1,293	183	885	1,068
\$5 but under \$6, . . . .	131	376	507	153	459	612
\$6 but under \$7, . . . .	430	309	739	394	346	740
\$7 but under \$8, . . . .	309	115	424	488	135	623
\$8 but under \$9, . . . .	449	53	502	400	61	461
\$9 but under \$10, . . . .	1,006	32	1,038	1,732	24	1,756
\$10 but under \$12, . . . .	1,705	13	1,718	1,979	21	2,000
\$12 but under \$15, . . . .	1,357	10	1,367	1,560	21	1,581
\$15 but under \$20, . . . .	531	2	533	666	1	667
\$20 and over, . . . . .	193	1	194	176	—	176
TOTALS, . . . . .	*6,320	1,995	*8,315	7,731	1,953	9,684

## FURNITURE. [120 Establishments.]

Under \$5, . . . . .	205	123	328	210	162	372
\$5 but under \$6, . . . .	143	74	217	112	74	186
\$6 but under \$7, . . . .	178	86	264	182	83	265
\$7 but under \$8, . . . .	265	62	327	214	74	288
\$8 but under \$9, . . . .	422	49	471	299	73	372
\$9 but under \$10, . . . .	488	69	557	800	40	840
\$10 but under \$12, . . . .	641	20	661	697	25	722
\$12 but under \$15, . . . .	767	5	772	797	2	799
\$15 but under \$20, . . . .	556	—	556	480	—	480
\$20 and over, . . . . .	88	—	88	119	1	120
TOTALS, . . . . .	3,753	488	4,241	3,710	534	4,244

\* Includes 1 with board.

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## GLASS. [10 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	46	15	61	53	22	75
\$5 but under \$6, . . . . .	14	2	16	18	3	21
\$6 but under \$7, . . . . .	30	6	36	39	6	45
\$7 but under \$8, . . . . .	52	4	56	35	4	39
\$8 but under \$9, . . . . .	33	—	33	21	—	21
\$9 but under \$10, . . . . .	22	1	23	24	—	24
\$10 but under \$12, . . . . .	41	1	42	41	1	42
\$12 but under \$15, . . . . .	42	—	42	47	—	47
\$15 but under \$20, . . . . .	126	—	126	129	—	129
\$20 and over, . . . . .	59	—	59	53	—	53
TOTALS, . . . . .	465	29	494	460	36	496

## GLUE, ISINGLASS, AND STARCH. [14 Establishments.]

Under \$5, . . . . .	—	39	39	4	8	12
\$5 but under \$6, . . . . .	6	5	11	17	35	52
\$6 but under \$7, . . . . .	28	1	29	34	5	39
\$7 but under \$8, . . . . .	30	16	46	76	16	92
\$8 but under \$9, . . . . .	41	—	41	42	1	43
\$9 but under \$10, . . . . .	168	—	168	131	—	131
\$10 but under \$12, . . . . .	136	—	136	139	—	139
\$12 but under \$15, . . . . .	46	—	46	39	—	39
\$15 but under \$20, . . . . .	20	—	20	17	—	17
\$20 and over, . . . . .	—	—	—	1	—	1
TOTALS, . . . . .	525	61	586	500	65	565

## HAIR WORK (ANIMAL AND HUMAN). [10 Establishments.]

Under \$5, . . . . .	12	30	42	8	30	38
\$5 but under \$6, . . . . .	5	34	39	3	58	61
\$6 but under \$7, . . . . .	1	46	47	4	8	12
\$7 but under \$8, . . . . .	5	—	5	4	1	5
\$8 but under \$9, . . . . .	9	6	15	5	4	9
\$9 but under \$10, . . . . .	11	1	12	16	—	16
\$10 but under \$12, . . . . .	28	5	33	20	4	24
\$12 but under \$15, . . . . .	24	1	25	33	—	33
\$15 but under \$20, . . . . .	3	1	4	15	—	15
\$20 and over, . . . . .	1	—	1	2	—	2
TOTALS, . . . . .	90	124	223	110	105	215

## HOSE: RUBBER, LINEN, ETC. [5 Establishments.]

Under \$5, . . . . .	10	11	21	17	21	38
\$5 but under \$6, . . . . .	8	6	14	9	12	21
\$6 but under \$7, . . . . .	11	3	14	10	6	16
\$7 but under \$8, . . . . .	12	6	18	10	8	18
\$8 but under \$9, . . . . .	17	1	18	17	1	18
\$9 but under \$10, . . . . .	31	1	32	32	5	37
\$10 but under \$12, . . . . .	28	2	30	35	1	36
\$12 but under \$15, . . . . .	26	—	26	42	1	43
\$15 but under \$20, . . . . .	25	—	25	34	—	34
\$20 and over, . . . . .	4	—	4	9	—	9
TOTALS, . . . . .	172	30	202	215	55	270



## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## HOSIERY AND KNIT GOODS. [40 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	280	1,304	1,584	276	1,728	2,002
\$5 but under \$6, . . . .	114	903	917	121	936	1,057
\$6 but under \$7, . . . .	306	761	1,067	356	838	1,194
\$7 but under \$8, . . . .	155	466	621	151	514	665
\$8 but under \$9, . . . .	79	214	293	101	276	377
\$9 but under \$10, . . . .	142	100	242	146	141	287
\$10 but under \$12, . . . .	145	67	212	173	56	229
\$12 but under \$15, . . . .	120	3	123	114	7	121
\$15 but under \$20, . . . .	55	2	57	61	2	63
\$20 and over, . . . . .	39	—	39	24	—	24
TOTALS, . . . . .	1,435	3,720	5,155	1,523	4,496	6,019

## INK, MUCILAGE, AND PASTE. [8 Establishments.]

Under \$5, . . . . .	5	18	23	2	34	36
\$5 but under \$6, . . . .	2	9	11	8	11	19
\$6 but under \$7, . . . .	4	9	13	4	5	9
\$7 but under \$8, . . . .	6	7	13	17	4	21
\$8 but under \$9, . . . .	4	6	10	6	—	6
\$9 but under \$10, . . . .	3	—	3	4	1	5
\$10 but under \$12, . . . .	29	—	29	9	—	9
\$12 but under \$15, . . . .	2	—	2	8	—	8
\$15 but under \$20, . . . .	8	—	8	7	—	7
\$20 and over, . . . . .	4	—	4	4	—	4
TOTALS, . . . . .	67	49	116	69	55	124

## IVORY, BONE, SHELL, AND HORN GOODS, ETC. [13 Establishments.]

Under \$5, . . . . .	29	13	42	23	9	32
\$5 but under \$6, . . . .	11	16	27	31	17	48
\$6 but under \$7, . . . .	31	46	77	44	41	85
\$7 but under \$8, . . . .	34	6	40	36	9	45
\$8 but under \$9, . . . .	39	1	40	46	5	51
\$9 but under \$10, . . . .	106	—	106	82	—	82
\$10 but under \$12, . . . .	117	1	118	129	1	130
\$12 but under \$15, . . . .	63	—	63	64	—	64
\$15 but under \$20, . . . .	16	—	16	15	—	15
\$20 and over, . . . . .	2	—	2	2	—	2
TOTALS, . . . . .	448	83	531	472	82	554

## LEATHER. [154 Establishments.]

Under \$5, . . . . .	118	42	160	104	28	132
\$5 but under \$6, . . . .	144	33	177	117	48	165
\$6 but under \$7, . . . .	291	24	315	281	24	305
\$7 but under \$8, . . . .	361	25	386	442	29	471
\$8 but under \$9, . . . .	739	7	746	512	6	518
\$9 but under \$10, . . . .	1,372	10	1,382	1,420	13	1,433
\$10 but under \$12, . . . .	1,777	7	1,784	1,590	2	1,592
\$12 but under \$15, . . . .	1,588	—	1,588	1,260	—	1,260
\$15 but under \$20, . . . .	568	1	569	493	—	493
\$20 and over, . . . . .	192	—	192	157	—	157
TOTALS, . . . . .	7,150	149	7,299	6,476	150	6,626

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## LIQUORS AND BEVERAGES (NOT SPIRITUOUS). [12 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	1	-	1	-	-	-
\$5 but under \$6, . . . . .	3	-	3	3	-	3
\$6 but under \$7, . . . . .	3	-	3	3	-	3
\$7 but under \$8, . . . . .	11	-	11	2	-	2
\$8 but under \$9, . . . . .	16	-	16	12	-	12
\$9 but under \$10, . . . . .	12	-	12	24	-	24
\$10 but under \$12, . . . . .	21	-	21	22	-	22
\$12 but under \$15, . . . . .	56	-	56	53	-	53
\$15 but under \$20, . . . . .	28	-	28	24	-	24
\$20 and over, . . . . .	4	-	4	4	-	4
TOTALS, . . . . .	155	-	155	157	-	157

## LIQUORS: MALT, DISTILLED, AND FERMENTED. [49 Establishments.]

Under \$5, . . . . .	8	1	9	9	-	9
\$5 but under \$6, . . . . .	5	-	5	3	-	3
\$6 but under \$7, . . . . .	5	-	5	9	-	9
\$7 but under \$8, . . . . .	25	1	26	14	2	16
\$8 but under \$9, . . . . .	22	1	23	29	-	29
\$9 but under \$10, . . . . .	111	-	111	117	1	118
\$10 but under \$12, . . . . .	142	-	142	131	-	131
\$12 but under \$15, . . . . .	455	-	455	531	-	531
\$15 but under \$20, . . . . .	280	-	280	284	-	284
\$20 and over, . . . . .	45	-	45	43	-	43
TOTALS, . . . . .	1,078	3	1,081	1,170	3	1,173

## LUMBER. [25 Establishments.]

Under \$5, . . . . .	22	17	39	14	2	16
\$5 but under \$6, . . . . .	9	7	16	5	19	24
\$6 but under \$7, . . . . .	35	1	36	15	6	21
\$7 but under \$8, . . . . .	64	-	64	68	-	68
\$8 but under \$9, . . . . .	36	-	36	47	-	47
\$9 but under \$10, . . . . .	304	-	304	245	2	247
\$10 but under \$12, . . . . .	154	-	154	175	-	175
\$12 but under \$15, . . . . .	108	-	108	127	-	127
\$15 but under \$20, . . . . .	78	-	78	88	-	88
\$20 and over, . . . . .	12	-	12	21	-	21
TOTALS, . . . . .	823	25	847	805	29	834

## MACHINES AND MACHINERY. [263 Establishments.]

Under \$5, . . . . .	1,042	55	1,097	1,089	43	1,132
\$5 but under \$6, . . . . .	555	20	575	614	29	643
\$6 but under \$7, . . . . .	1,181	66	1,247	1,095	59	1,154
\$7 but under \$8, . . . . .	1,532	27	1,559	1,395	16	1,411
\$8 but under \$9, . . . . .	1,243	11	1,254	1,202	11	1,213
\$9 but under \$10, . . . . .	2,117	7	2,124	2,167	6	2,173
\$10 but under \$12, . . . . .	2,449	6	2,455	2,476	9	2,485
\$12 but under \$15, . . . . .	3,645	3	3,648	3,846	9	3,855
\$15 but under \$20, . . . . .	2,867	-	2,867	2,963	1	2,964
\$20 and over, . . . . .	647	-	647	669	-	669
TOTALS, . . . . .	17,278	195	17,473	17,516	183	17,699

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## METALS AND METALLIC GOODS. [277 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	979	465	1,444	943	377	1,320
\$5 but under \$6, . . . . .	606	334	940	706	307	1,013
\$6 but under \$7, . . . . .	927	299	1,226	979	356	1,335
\$7 but under \$8, . . . . .	1,366	216	1,582	1,557	318	1,875
\$8 but under \$9, . . . . .	1,762	127	1,889	1,984	148	2,132
\$9 but under \$10, . . . . .	2,673	61	2,734	2,809	73	2,882
\$10 but under \$12, . . . . .	2,531	22	2,553	2,676	23	2,699
\$12 but under \$15, . . . . .	3,040	27	3,067	3,112	11	3,123
\$15 but under \$20, . . . . .	2,256	6	2,262	2,386	—	2,386
\$20 and over, . . . . .	673	—	673	849	—	849
TOTALS, . . . . .	16,818	1,557	18,370	18,001	1,613	19,614

## MIXED TEXTILES. [13 Establishments.]

Under \$5, . . . . .	66	101	167	75	124	199
\$5 but under \$6, . . . . .	36	83	119	35	63	98
\$6 but under \$7, . . . . .	106	54	160	101	39	140
\$7 but under \$8, . . . . .	185	20	185	148	19	167
\$8 but under \$9, . . . . .	59	8	67	74	10	84
\$9 but under \$10, . . . . .	90	8	93	79	4	83
\$10 but under \$12, . . . . .	62	—	62	50	4	54
\$12 but under \$15, . . . . .	30	—	30	36	—	36
\$15 but under \$20, . . . . .	29	—	29	36	1	37
\$20 and over, . . . . .	11	—	11	9	—	9
TOTALS, . . . . .	654	269	923	643	264	907

## MODELS AND PATTERNS. [5 Establishments.]

Under \$5, . . . . .	1	—	1	1	—	1
\$5 but under \$6, . . . . .	—	2	2	1	—	1
\$6 but under \$7, . . . . .	—	—	—	1	—	1
\$7 but under \$8, . . . . .	—	—	—	—	1	1
\$8 but under \$9, . . . . .	4	—	4	4	—	4
\$9 but under \$10, . . . . .	—	—	—	1	—	1
\$10 but under \$12, . . . . .	5	—	5	1	—	1
\$12 but under \$15, . . . . .	10	—	10	6	—	6
\$15 but under \$20, . . . . .	21	—	21	29	—	29
\$20 and over, . . . . .	3	—	3	1	—	1
TOTALS, . . . . .	44	2	46	44	1	45

## MUSICAL INSTRUMENTS AND MATERIALS. [46 Establishments.]

Under \$5, . . . . .	87	12	99	82	12	94
\$5 but under \$6, . . . . .	48	17	65	58	16	74
\$6 but under \$7, . . . . .	83	23	106	96	26	122
\$7 but under \$8, . . . . .	72	18	90	90	11	101
\$8 but under \$9, . . . . .	83	3	86	97	2	99
\$9 but under \$10, . . . . .	165	3	168	161	4	165
\$10 but under \$12, . . . . .	301	6	307	259	7	266
\$12 but under \$15, . . . . .	695	1	696	661	—	661
\$15 but under \$20, . . . . .	947	—	947	916	—	916
\$20 and over, . . . . .	415	—	415	333	—	333
TOTALS, . . . . .	2,896	83	2,979	2,753	78	2,831

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## OILS AND ILLUMINATING FLUIDS. [9 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	3	12	15	2	1	3
\$5 but under \$6, . . . . .	2	-	2	-	7	7
\$6 but under \$7, . . . . .	5	1	6	1	16	17
\$7 but under \$8, . . . . .	6	2	8	1	3	4
\$8 but under \$9, . . . . .	6	-	6	10	1	11
\$9 but under \$10, . . . . .	37	-	37	44	1	45
\$10 but under \$12, . . . . .	67	-	67	67	-	67
\$12 but under \$15, . . . . .	49	-	49	69	-	69
\$15 but under \$20, . . . . .	9	-	9	8	-	8
\$20 and over, . . . . .	2	-	2	1	-	1
TOTALS, . . . . .	186	15	201	203	29	232

## PAINTS, COLORS, AND CRUDE CHEMICALS. [16 Establishments.]

Under \$5, . . . . .	4	10	14	9	6	15
\$5 but under \$6, . . . . .	11	1	12	4	3	7
\$6 but under \$7, . . . . .	6	2	8	8	5	13
\$7 but under \$8, . . . . .	3	5	8	5	4	9
\$8 but under \$9, . . . . .	5	1	6	9	1	10
\$9 but under \$10, . . . . .	78	1	79	85	-	85
\$10 but under \$12, . . . . .	59	-	59	53	-	53
\$12 but under \$15, . . . . .	53	-	53	54	-	54
\$15 but under \$20, . . . . .	15	-	15	19	-	19
\$20 and over, . . . . .	4	-	4	4	-	4
TOTALS, . . . . .	238	20	258	250	19	269

## PAPER AND PAPER GOODS. [102 Establishments.]

Under \$5, . . . . .	207	1,188	1,400	219	1,186	1,405
\$5 but under \$6, . . . . .	134	1,037	1,171	112	1,113	1,225
\$6 but under \$7, . . . . .	272	1,069	1,331	208	1,235	1,443
\$7 but under \$8, . . . . .	608	727	1,335	595	775	1,370
\$8 but under \$9, . . . . .	656	278	934	633	289	922
\$9 but under \$10, . . . . .	1,155	99	1,254	1,279	144	1,423
\$10 but under \$12, . . . . .	771	47	818	755	64	819
\$12 but under \$15, . . . . .	830	15	845	876	15	891
\$15 but under \$20, . . . . .	743	2	745	725	4	729
\$20 and over, . . . . .	181	1	182	225	-	225
TOTALS, . . . . .	5,567	4,458	10,015	5,627	4,825	10,452

## PERFUMES, TOILET ARTICLES, ETC. [4 Establishments.]

Under \$5, . . . . .	-	-	-	-	3	3
\$5 but under \$6, . . . . .	4	6	10	4	3	7
\$6 but under \$7, . . . . .	-	11	11	1	10	11
\$7 but under \$8, . . . . .	-	1	1	-	3	3
\$8 but under \$9, . . . . .	-	3	3	3	5	8
\$9 but under \$10, . . . . .	2	6	8	-	-	-
\$10 but under \$12, . . . . .	2	-	2	2	-	2
\$12 but under \$15, . . . . .	-	-	-	-	-	-
\$15 but under \$20, . . . . .	3	-	3	7	-	7
\$20 and over, . . . . .	-	-	-	-	-	-
TOTALS, . . . . .	11	27	38	17	24	41

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## PHOTOGRAPHS AND PHOTOGRAPHIC MATERIALS. [11 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	11	11	22	8	3	11
\$5 but under \$6, . . . . .	3	3	6	3	3	6
\$6 but under \$7, . . . . .	3	3	6	2	5	7
\$7 but under \$8, . . . . .	5	9	14	2	8	10
\$8 but under \$9, . . . . .	1	11	12	5	9	14
\$9 but under \$10, . . . . .	11	6	17	7	9	16
\$10 but under \$12, . . . . .	11	12	23	13	13	26
\$12 but under \$15, . . . . .	14	7	21	17	8	25
\$15 but under \$20, . . . . .	13	5	18	11	7	18
\$20 and over, . . . . .	26	—	26	19	—	19
TOTALS, . . . . .	98	67	165	87	65	152

## POLISHES AND DRESSING. [18 Establishments.]

Under \$5, . . . . .	3	30	33	10	16	26
\$5 but under \$6, . . . . .	6	23	29	7	9	16
\$6 but under \$7, . . . . .	4	30	34	4	28	32
\$7 but under \$8, . . . . .	4	16	20	3	1	4
\$8 but under \$9, . . . . .	5	9	14	3	5	8
\$9 but under \$10, . . . . .	12	6	18	5	8	13
\$10 but under \$12, . . . . .	24	3	27	26	14	40
\$12 but under \$15, . . . . .	38	2	40	37	33	70
\$15 but under \$20, . . . . .	25	—	25	31	8	39
\$20 and over, . . . . .	18	—	18	14	—	14
TOTALS, . . . . .	139	119	258	140	122	262

## PRINTING, PUBLISHING, AND BOOKBINDING. [24 Establishments.]

Under \$5, . . . . .	173	161	334	166	171	337
\$5 but under \$6, . . . . .	58	69	127	73	76	149
\$6 but under \$7, . . . . .	57	114	171	67	108	175
\$7 but under \$8, . . . . .	44	104	148	47	110	157
\$8 but under \$9, . . . . .	59	86	145	63	78	141
\$9 but under \$10, . . . . .	85	46	131	65	43	108
\$10 but under \$12, . . . . .	95	46	141	122	56	178
\$12 but under \$15, . . . . .	171	21	192	162	22	184
\$15 but under \$20, . . . . .	300	5	305	301	5	306
\$20 and over, . . . . .	259	5	264	269	4	273
TOTALS, . . . . .	1,301	657	1,958	1,335	673	2,008

## PRINT WORKS, DYE WORKS, AND BLEACHERIES. [37 Establishments.]

Under \$5, . . . . .	616	245	861	525	219	744
\$5 but under \$6, . . . . .	174	337	511	170	274	444
\$6 but under \$7, . . . . .	613	371	984	521	353	879
\$7 but under \$8, . . . . .	1,085	146	1,231	1,125	107	1,232
\$8 but under \$9, . . . . .	510	59	569	497	60	557
\$9 but under \$10, . . . . .	608	25	633	590	28	618
\$10 but under \$12, . . . . .	364	13	377	360	9	369
\$12 but under \$15, . . . . .	289	5	294	272	4	276
\$15 but under \$20, . . . . .	184	1	185	192	—	192
\$20 and over, . . . . .	234	—	234	247	—	247
TOTALS, . . . . .	4,677	1,202	5,879	4,499	1,059	5,558

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## RAILROAD CONSTRUCTION AND EQUIPMENT. [14 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	4	-	4	18	-	18
\$5 but under \$6, . . . . .	15	-	15	7	-	7
\$6 but under \$7, . . . . .	43	-	43	53	-	53
\$7 but under \$8, . . . . .	108	-	108	105	-	105
\$8 but under \$9, . . . . .	123	-	123	164	-	164
\$9 but under \$10, . . . . .	529	-	529	574	-	574
\$10 but under \$12, . . . . .	502	-	502	516	-	516
\$12 but under \$15, . . . . .	1,046	-	1,046	1,330	-	1,330
\$15 but under \$20, . . . . .	504	-	504	518	-	518
\$20 and over, . . . . .	48	-	48	32	-	32
TOTALS, . . . . .	2,922	-	2,922	3,817	-	3,817

## RUBBER AND ELASTIC GOODS. [80 Establishments.]

Under \$5, . . . . .	288	662	950	208	673	881
\$5 but under \$6, . . . . .	129	409	538	154	403	557
\$6 but under \$7, . . . . .	277	617	894	209	583	792
\$7 but under \$8, . . . . .	441	783	1,224	495	800	1,295
\$8 but under \$9, . . . . .	618	503	1,121	572	540	1,112
\$9 but under \$10, . . . . .	771	369	1,140	935	446	1,381
\$10 but under \$12, . . . . .	828	251	1,079	809	806	1,615
\$12 but under \$15, . . . . .	810	76	886	926	88	1,014
\$15 but under \$20, . . . . .	717	8	725	759	10	769
\$20 and over, . . . . .	211	1	212	115	-	115
TOTALS, . . . . .	5,090	3,679	8,769	5,182	3,849	9,031

## SCIENTIFIC INSTRUMENTS AND APPLIANCES. [11 Establishments.]

Under \$5, . . . . .	121	52	173	115	45	160
\$5 but under \$6, . . . . .	54	20	74	86	35	121
\$6 but under \$7, . . . . .	69	21	90	95	22	117
\$7 but under \$8, . . . . .	90	5	95	80	11	91
\$8 but under \$9, . . . . .	66	3	69	105	5	110
\$9 but under \$10, . . . . .	116	2	118	113	2	115
\$10 but under \$12, . . . . .	98	2	100	113	3	116
\$12 but under \$15, . . . . .	116	-	116	124	-	124
\$15 but under \$20, . . . . .	95	-	95	79	-	79
\$20 and over, . . . . .	22	-	22	23	-	23
TOTALS, . . . . .	847	105	952	933	128	1,066

## SHIPBUILDING. [42 Establishments.]

Under \$5, . . . . .	7	-	7	28	-	28
\$5 but under \$6, . . . . .	7	-	7	6	-	6
\$6 but under \$7, . . . . .	8	-	8	7	-	7
\$7 but under \$8, . . . . .	9	-	9	7	-	7
\$8 but under \$9, . . . . .	25	-	25	44	-	44
\$9 but under \$10, . . . . .	46	-	46	40	-	40
\$10 but under \$12, . . . . .	198	-	198	147	-	147
\$12 but under \$15, . . . . .	243	-	243	283	-	283
\$15 but under \$20, . . . . .	362	-	362	428	-	428
\$20 and over, . . . . .	139	-	139	162	-	162
TOTALS, . . . . .	1,044	-	1,044	1,152	-	1,152

## WAGES PAID: BY INDUSTRIES — Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES — 1890, 1891  
— Continued.

## SILK AND SILK GOODS. [9 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	79	305	384	53	270	323
\$5 but under \$6, . . . . .	73	628	701	63	605	668
\$6 but under \$7, . . . . .	120	334	454	49	339	388
\$7 but under \$8, . . . . .	50	138	188	63	97	160
\$8 but under \$9, . . . . .	57	60	117	51	69	120
\$9 but under \$10, . . . . .	55	43	108	97	68	165
\$10 but under \$12, . . . . .	108	121	229	157	153	310
\$12 but under \$15, . . . . .	176	25	201	90	1	91
\$15 but under \$20, . . . . .	77	2	79	81	—	81
\$20 and over, . . . . .	25	—	25	24	—	24
TOTALS, . . . . .	830	1,656	2,486	728	1,602	2,330

## SPORTING AND ATHLETIC GOODS. [9 Establishments.]

Under \$5, . . . . .	30	16	46	50	12	62
\$5 but under \$6, . . . . .	27	8	35	14	1	15
\$6 but under \$7, . . . . .	20	20	40	37	38	75
\$7 but under \$8, . . . . .	45	—	45	50	6	56
\$8 but under \$9, . . . . .	21	—	21	26	—	26
\$9 but under \$10, . . . . .	56	—	56	75	—	75
\$10 but under \$12, . . . . .	51	1	52	65	—	65
\$12 but under \$15, . . . . .	71	—	71	81	1	82
\$15 but under \$20, . . . . .	22	—	22	26	—	26
\$20 and over, . . . . .	12	—	12	15	—	15
TOTALS, . . . . .	355	40	395	439	58	497

## STONE. [111 Establishments.]

Under \$5, . . . . .	106	—	106	105	—	105
\$5 but under \$6, . . . . .	78	—	78	107	—	107
\$6 but under \$7, . . . . .	87	—	87	112	—	112
\$7 but under \$8, . . . . .	128	—	128	152	—	152
\$8 but under \$9, . . . . .	146	—	146	152	—	152
\$9 but under \$10, . . . . .	479	—	479	387	—	387
\$10 but under \$12, . . . . .	1,009	—	1,009	989	—	989
\$12 but under \$15, . . . . .	679	—	679	807	—	807
\$15 but under \$20, . . . . .	1,002	—	1,002	1,150	—	1,150
\$20 and over, . . . . .	305	—	305	309	—	309
TOTALS, . . . . .	4,019	—	4,019	4,270	—	4,270

## STRAW AND PALM LEAF GOODS. [17 Establishments.]

Under \$5, . . . . .	33	161	199	29	198	227
\$5 but under \$6, . . . . .	27	233	260	41	224	265
\$6 but under \$7, . . . . .	51	277	328	76	320	396
\$7 but under \$8, . . . . .	112	294	406	108	318	426
\$8 but under \$9, . . . . .	91	528	619	70	558	628
\$9 but under \$10, . . . . .	261	288	549	286	274	560
\$10 but under \$12, . . . . .	205	270	475	187	250	437
\$12 but under \$15, . . . . .	296	180	475	369	178	547
\$15 but under \$20, . . . . .	112	87	199	163	89	252
\$20 and over, . . . . .	18	8	26	18	1	19
TOTALS, . . . . .	1,210	2,276	3,486	1,847	2,360	3,707

## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## TALLOW, CANDLES, SOAP, AND GREASE. [55 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	30	76	106	26	72	98
\$5 but under \$6, . . . . .	17	8	25	10	8	18
\$6 but under \$7, . . . . .	8	3	11	15	4	19
\$7 but under \$8, . . . . .	34	3	37	43	4	47
\$8 but under \$9, . . . . .	70	2	72	54	2	56
\$9 but under \$10, . . . . .	184	—	184	162	—	162
\$10 but under \$12, . . . . .	143	—	143	149	—	149
\$12 but under \$15, . . . . .	95	1	96	90	1	91
\$15 but under \$20, . . . . .	44	—	44	39	—	39
\$20 and over, . . . . .	8	—	8	10	—	10
TOTALS, . . . . .	633	93	726	598	91	689

## TOBACCO, SNUFF, AND CIGARS. [35 Establishments.]

Under \$5, . . . . .	35	174	209	37	176	213
\$5 but under \$6, . . . . .	16	79	95	20	78	93
\$6 but under \$7, . . . . .	12	74	86	21	87	108
\$7 but under \$8, . . . . .	17	59	76	17	43	60
\$8 but under \$9, . . . . .	21	9	30	33	10	43
\$9 but under \$10, . . . . .	47	31	78	53	20	73
\$10 but under \$12, . . . . .	134	36	170	141	29	170
\$12 but under \$15, . . . . .	259	31	290	285	30	315
\$15 but under \$20, . . . . .	346	3	349	360	13	373
\$20 and over, . . . . .	183	1	189	167	2	169
TOTALS, . . . . .	1,075	497	1,572	1,134	483	1,617

## TOYS AND GAMES (CHILDREN'S). [8 Establishments.]

Under \$5, . . . . .	81	62	143	111	65	176
\$5 but under \$6, . . . . .	33	18	51	47	22	69
\$6 but under \$7, . . . . .	127	20	147	60	29	89
\$7 but under \$8, . . . . .	57	16	73	66	18	84
\$8 but under \$9, . . . . .	34	7	41	36	5	41
\$9 but under \$10, . . . . .	46	2	48	63	5	68
\$10 but under \$12, . . . . .	48	2	50	46	—	46
\$12 but under \$15, . . . . .	43	—	43	50	—	50
\$15 but under \$20, . . . . .	30	—	30	26	—	26
\$20 and over, . . . . .	9	—	9	11	—	11
TOTALS, . . . . .	508	127	635	516	144	660

## TRUNKS AND VALISES. [7 Establishments.]

Under \$5, . . . . .	4	4	8	4	5	9
\$5 but under \$6, . . . . .	7	3	10	4	1	5
\$6 but under \$7, . . . . .	2	1	3	3	4	7
\$7 but under \$8, . . . . .	3	—	3	5	—	5
\$8 but under \$9, . . . . .	3	—	3	4	—	4
\$9 but under \$10, . . . . .	6	—	6	5	—	5
\$10 but under \$12, . . . . .	17	—	17	19	—	19
\$12 but under \$15, . . . . .	23	—	23	29	—	29
\$15 but under \$20, . . . . .	41	—	41	37	—	37
\$20 and over, . . . . .	7	—	7	7	—	7
TOTALS, . . . . .	113	8	121	117	10	127



## WAGES PAID: BY INDUSTRIES—Continued.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES—1890, 1891  
—Continued.

## WHIPS, LASHES, AND STOCKS. [15 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	18	21	39	28	20	48
\$5 but under \$6, . . . . .	9	30	39	22	24	46
\$6 but under \$7, . . . . .	20	44	64	11	54	65
\$7 but under \$8, . . . . .	25	28	53	19	20	39
\$8 but under \$9, . . . . .	28	11	37	15	16	31
\$9 but under \$10, . . . . .	43	6	49	31	10	41
\$10 but under \$12, . . . . .	57	1	58	39	3	42
\$12 but under \$15, . . . . .	60	—	60	72	—	72
\$15 but under \$20, . . . . .	46	—	46	40	—	40
\$20 and over, . . . . .	8	—	8	13	—	13
TOTALS, . . . . .	312	141	453	290	147	437

## WOODEN GOODS. [149 Establishments.]

Under \$5, . . . . .	93	33	126	114	33	147
\$5 but under \$6, . . . . .	77	14	91	87	9	96
\$6 but under \$7, . . . . .	123	14	137	139	13	152
\$7 but under \$8, . . . . .	220	6	226	255	5	260
\$8 but under \$9, . . . . .	225	5	230	224	4	228
\$9 but under \$10, . . . . .	428	2	430	469	8	472
\$10 but under \$12, . . . . .	359	9	368	388	5	393
\$12 but under \$15, . . . . .	577	2	579	570	5	575
\$15 but under \$20, . . . . .	779	1	780	937	2	939
\$20 and over, . . . . .	162	2	164	157	2	159
TOTALS, . . . . .	3,043	88	3,131	3,840	81	3,421

## WOOLLEN GOODS. [138 Establishments.]

Under \$5, . . . . .	1,281	1,978	3,259	1,224	1,927	3,151
\$5 but under \$6, . . . . .	696	889	1,585	947	910	1,757
\$6 but under \$7, . . . . .	1,635	1,206	2,841	1,700	1,195	2,895
\$7 but under \$8, . . . . .	2,048	1,113	3,161	2,081	1,268	3,349
\$8 but under \$9, . . . . .	1,325	763	2,088	1,335	708	2,043
\$9 but under \$10, . . . . .	1,646	555	2,201	1,606	482	2,088
\$10 but under \$12, . . . . .	1,331	270	1,601	1,423	354	1,777
\$12 but under \$15, . . . . .	852	60	912	896	73	969
\$15 but under \$20, . . . . .	480	2	482	465	2	467
\$20 and over, . . . . .	168	—	168	196	—	196
TOTALS, . . . . .	11,442	6,836	18,278	11,773	6,919	18,692

## WORSTED GOODS. [21 Establishments.]

Under \$5, . . . . .	601	1,141	1,742	455	1,165	1,620
\$5 but under \$6, . . . . .	249	1,113	1,362	360	967	1,327
\$6 but under \$7, . . . . .	578	1,304	1,882	481	1,142	1,623
\$7 but under \$8, . . . . .	747	443	1,190	783	336	1,119
\$8 but under \$9, . . . . .	360	202	562	376	187	563
\$9 but under \$10, . . . . .	380	107	487	441	147	588
\$10 but under \$12, . . . . .	658	104	762	645	152	797
\$12 but under \$15, . . . . .	528	28	556	479	21	500
\$15 but under \$20, . . . . .	159	—	159	135	1	136
\$20 and over, . . . . .	87	—	87	72	—	72
TOTALS, . . . . .	4,347	4,442	8,789	4,227	4,118	8,345

## WAGES PAID: BY INDUSTRIES — Concluded.

CLASSIFIED WEEKLY WAGES: BY INDUSTRIES — 1890, 1891  
— Concluded.

## ALL INDUSTRIES. [3,745 Establishments.]

CLASSIFICATION OF WEEKLY WAGE.	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	*17,876	28,980	*46,856	17,466	29,328	46,792
\$5 but under \$6, . . . .	9,456	19,392	28,848	10,133	20,058	30,191
\$6 but under \$7, . . . .	17,364	20,229	37,593	17,236	20,520	37,756
\$7 but under \$8, . . . .	18,364	14,242	32,606	18,835	14,942	33,777
\$8 but under \$9, . . . .	16,994	9,110	26,104	17,630	10,053	27,683
\$9 but under \$10, . . . .	26,672	6,278	32,950	28,591	6,603	35,194
\$10 but under \$12, . . . .	30,603	4,647	35,250	30,981	4,820	35,801
\$12 but under \$15, . . . .	35,821	2,552	38,373	36,687	2,394	39,081
\$15 but under \$20, . . . .	28,208	715	28,923	29,055	789	29,844
\$20 and over, . . . . .	9,619	94	9,713	9,515	90	9,605
TOTALS, . . . . .	*210,977	106,289	*317,216	216,129	109,595	325,724

\* Includes 1 with board.



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PROPORTION OF BUSINESS DONE:  
BY INDUSTRIES.

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# PROPORTION OF BUSINESS DONE: BY INDUSTRIES.

[In this presentation, greatest capacity, or maximum production, has been considered as 100 per cent, and the "percentages" given indicate the proportions, for the number of establishments specified, on the basis stated.]

## PERCENTAGES — 1890, 1891.

INDUSTRIES, AND, PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND, PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Agricultural Implements.</i>	11	11	<i>Artisans' Tools.</i>	56	56
25 per cent, . . . . .	-	1	6 per cent, . . . . .	-	1
33 per cent, . . . . .	-	1	10 per cent, . . . . .	1	-
35 per cent, . . . . .	1	-	13 per cent, . . . . .	1	1
40 per cent, . . . . .	1	1	16 per cent, . . . . .	-	1
50 per cent, . . . . .	3	1	20 per cent, . . . . .	1	1
55 per cent, . . . . .	1	-	25 per cent, . . . . .	2	4
60 per cent, . . . . .	-	2	33 per cent, . . . . .	2	-
67 per cent, . . . . .	-	1	50 per cent, . . . . .	11	7
69 per cent, . . . . .	-	1	60 per cent, . . . . .	1	6
70 per cent, . . . . .	-	1	65 per cent, . . . . .	1	3
74 per cent, . . . . .	1	-	67 per cent, . . . . .	1	1
75 per cent, . . . . .	2	2	70 per cent, . . . . .	-	3
80 per cent, . . . . .	2	-	75 per cent, . . . . .	15	9
			77 per cent, . . . . .	-	1
<i>Arms and Ammunition.</i>	12	12	80 per cent, . . . . .	5	3
10 per cent, . . . . .	-	1	85 per cent, . . . . .	2	2
15 per cent, . . . . .	1	-	86 per cent, . . . . .	1	1
17 per cent, . . . . .	1	1	90 per cent, . . . . .	2	5
25 per cent, . . . . .	1	-	92 per cent, . . . . .	1	-
33 per cent, . . . . .	-	1	95 per cent, . . . . .	1	1
50 per cent, . . . . .	1	-	100 per cent, . . . . .	3	6
60 per cent, . . . . .	-	1			
66 per cent, . . . . .	1	-	<i>Awnings, Sails, Tents, etc.</i>	30	30
70 per cent, . . . . .	1	-	5 per cent, . . . . .	1	-
76 per cent, . . . . .	2	2	10 per cent, . . . . .	1	4
80 per cent, . . . . .	1	2	15 per cent, . . . . .	1	-
90 per cent, . . . . .	1	1	20 per cent, . . . . .	-	1
97 per cent, . . . . .	1	-	25 per cent, . . . . .	6	1
98 per cent, . . . . .	-	1	33 per cent, . . . . .	2	2
100 per cent, . . . . .	1	2	35 per cent, . . . . .	-	1

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.

PERCENTAGES—1890, 1891—Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Awning, Sails, Tents, etc.—Con.</i>			<i>Boots and Shoes—Con.</i>		
40 per cent, . . . . .	—	1	75 per cent, . . . . .	117	97
50 per cent, . . . . .	8	10	76 per cent, . . . . .	2	—
60 per cent, . . . . .	2	2	77 per cent, . . . . .	1	3
65 per cent, . . . . .	—	1	78 per cent, . . . . .	1	2
67 per cent, . . . . .	—	2	80 per cent, . . . . .	42	42
70 per cent, . . . . .	2	2	81 per cent, . . . . .	1	—
75 per cent, . . . . .	3	1	82 per cent, . . . . .	2	1
80 per cent, . . . . .	1	—	83 per cent, . . . . .	—	2
100 per cent, . . . . .	3	2	84 per cent, . . . . .	—	1
			85 per cent, . . . . .	17	13
<i>Boots and Shoes.</i>	567	567	87 per cent, . . . . .	4	—
10 per cent, . . . . .	4	5	88 per cent, . . . . .	2	1
12 per cent, . . . . .	1	1	90 per cent, . . . . .	35	32
17 per cent, . . . . .	1	—	91 per cent, . . . . .	2	1
18 per cent, . . . . .	1	1	92 per cent, . . . . .	—	1
20 per cent, . . . . .	4	7	93 per cent, . . . . .	1	1
24 per cent, . . . . .	—	1	94 per cent, . . . . .	—	1
25 per cent, . . . . .	20	22	95 per cent, . . . . .	11	16
30 per cent, . . . . .	2	9	96 per cent, . . . . .	2	2
33 per cent, . . . . .	14	21	97 per cent, . . . . .	2	—
35 per cent, . . . . .	1	1	100 per cent, . . . . .	79	45
37 per cent, . . . . .	—	1			
38 per cent, . . . . .	1	—	<i>Boxes (Paper and Wooden).</i>	141	141
39 per cent, . . . . .	1	—	10 per cent, . . . . .	—	1
40 per cent, . . . . .	4	8	13 per cent, . . . . .	1	—
42 per cent, . . . . .	1	—	19 per cent, . . . . .	1	—
43 per cent, . . . . .	—	2	20 per cent, . . . . .	1	1
45 per cent, . . . . .	3	2	25 per cent, . . . . .	6	4
48 per cent, . . . . .	1	—	30 per cent, . . . . .	—	2
49 per cent, . . . . .	—	1	33 per cent, . . . . .	3	4
50 per cent, . . . . .	97	92	35 per cent, . . . . .	2	1
54 per cent, . . . . .	—	1	37 per cent, . . . . .	1	—
55 per cent, . . . . .	—	4	40 per cent, . . . . .	—	4
56 per cent, . . . . .	1	—	42 per cent, . . . . .	1	—
57 per cent, . . . . .	1	3	45 per cent, . . . . .	—	2
58 per cent, . . . . .	1	3	50 per cent, . . . . .	18	22
59 per cent, . . . . .	1	—	55 per cent, . . . . .	1	1
60 per cent, . . . . .	22	39	60 per cent, . . . . .	9	3
62 per cent, . . . . .	2	8	64 per cent, . . . . .	1	1
63 per cent, . . . . .	1	3	65 per cent, . . . . .	5	5
64 per cent, . . . . .	—	1	66 per cent, . . . . .	1	—
65 per cent, . . . . .	8	14	67 per cent, . . . . .	3	5
66 per cent, . . . . .	6	3	70 per cent, . . . . .	5	6
67 per cent, . . . . .	28	16	72 per cent, . . . . .	1	—
68 per cent, . . . . .	1	2	75 per cent, . . . . .	34	40
70 per cent, . . . . .	16	35	76 per cent, . . . . .	—	1
72 per cent, . . . . .	2	—	78 per cent, . . . . .	—	1

PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.  
 PERCENTAGES—1890, 1891—Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Boxes (Paper and Wooden) —Con.</i>			<i>Burial Cases, Caskets, Coffins, etc.—Con.</i>		
80 per cent, . . . . .	11	11	75 per cent, . . . . .	3	1
83 per cent, . . . . .	1	—	80 per cent, . . . . .	—	1
85 per cent, . . . . .	9	9	95 per cent, . . . . .	1	1
90 per cent, . . . . .	11	9	100 per cent, . . . . .	1	2
93 per cent, . . . . .	—	1			
95 per cent, . . . . .	1	2	<i>Buttons and Dress Trimmings.</i>	17	17
98 per cent, . . . . .	1	—	25 per cent, . . . . .	—	1
100 per cent, . . . . .	13	5	28 per cent, . . . . .	—	1
			33 per cent, . . . . .	1	—
<i>Brick, Tiles, and Sewer Pipe.</i>	45	45	38 per cent, . . . . .	1	—
40 per cent, . . . . .	1	—	40 per cent, . . . . .	2	1
50 per cent, . . . . .	7	5	45 per cent, . . . . .	—	1
60 per cent, . . . . .	—	1	50 per cent, . . . . .	4	2
62 per cent, . . . . .	1	—	60 per cent, . . . . .	2	3
63 per cent, . . . . .	1	1	62 per cent, . . . . .	1	—
65 per cent, . . . . .	1	—	65 per cent, . . . . .	—	1
67 per cent, . . . . .	1	2	70 per cent, . . . . .	—	1
70 per cent, . . . . .	3	3	75 per cent, . . . . .	3	2
72 per cent, . . . . .	—	1	90 per cent, . . . . .	1	1
75 per cent, . . . . .	5	4	100 per cent, . . . . .	2	3
80 per cent, . . . . .	10	8			
83 per cent, . . . . .	1	—	<i>Carpetings.</i>	12	12
85 per cent, . . . . .	1	1	50 per cent, . . . . .	1	1
90 per cent, . . . . .	3	2	53 per cent, . . . . .	1	—
95 per cent, . . . . .	—	1	55 per cent, . . . . .	1	—
99 per cent, . . . . .	1	—	60 per cent, . . . . .	—	1
100 per cent, . . . . .	9	16	65 per cent, . . . . .	1	—
			68 per cent, . . . . .	—	1
<i>Brooms, Brushes, and Mops.</i>	21	21	70 per cent, . . . . .	—	1
10 per cent, . . . . .	1	1	75 per cent, . . . . .	1	2
20 per cent, . . . . .	2	1	85 per cent, . . . . .	1	—
25 per cent, . . . . .	1	1	88 per cent, . . . . .	1	—
40 per cent, . . . . .	1	1	90 per cent, . . . . .	3	1
50 per cent, . . . . .	4	4	92 per cent, . . . . .	—	1
60 per cent, . . . . .	—	1	95 per cent, . . . . .	—	2
63 per cent, . . . . .	1	—	98 per cent, . . . . .	1	—
65 per cent, . . . . .	—	1	100 per cent, . . . . .	1	2
68 per cent, . . . . .	—	1			
70 per cent, . . . . .	3	—	<i>Carriages and Wagons.</i>	96	96
75 per cent, . . . . .	3	3	10 per cent, . . . . .	—	1
80 per cent, . . . . .	—	2	15 per cent, . . . . .	—	1
90 per cent, . . . . .	2	2	20 per cent, . . . . .	2	—
100 per cent, . . . . .	3	3	25 per cent, . . . . .	2	6
			30 per cent, . . . . .	1	—
<i>Burial Cases, Caskets, Coffins, etc.</i>	6	6	33 per cent, . . . . .	—	2
50 per cent, . . . . .	1	—	40 per cent, . . . . .	—	2
60 per cent, . . . . .	—	1	50 per cent, . . . . .	29	21



PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.  
 PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTABLISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTABLISHMENTS	
	1890	1891		1890	1891
<i>Carriages and Wagons — Con.</i>			<i>Clocks, Watches, and Jewelry — Con.</i>		
55 per cent, . . . . .	-	1	65 per cent, . . . . .	1	1
60 per cent, . . . . .	4	3	67 per cent, . . . . .	4	4
62 per cent, . . . . .	-	1	70 per cent, . . . . .	4	3
63 per cent, . . . . .	1	1	75 per cent, . . . . .	17	17
65 per cent, . . . . .	1	3	80 per cent, . . . . .	7	7
67 per cent, . . . . .	-	1	83 per cent, . . . . .	-	1
70 per cent, . . . . .	5	2	85 per cent, . . . . .	2	2
75 per cent, . . . . .	15	19	90 per cent, . . . . .	4	4
76 per cent, . . . . .	1	-	95 per cent, . . . . .	3	-
80 per cent, . . . . .	7	6	100 per cent, . . . . .	7	5
85 per cent, . . . . .	3	1			
88 per cent, . . . . .	-	1	<i>Clothing.</i>	113	113
90 per cent, . . . . .	7	12	15 per cent, . . . . .	1	-
92 per cent, . . . . .	1	-	20 per cent, . . . . .	-	1
95 per cent, . . . . .	-	1	25 per cent, . . . . .	-	1
100 per cent, . . . . .	17	11	30 per cent, . . . . .	-	1
			33 per cent, . . . . .	2	2
<i>Cement, Kaolin, Lime, and Plaster.</i>	4	4	38 per cent, . . . . .	-	1
60 per cent, . . . . .	1	-	40 per cent, . . . . .	1	-
75 per cent, . . . . .	2	3	45 per cent, . . . . .	-	1
80 per cent, . . . . .	-	1	50 per cent, . . . . .	11	12
96 per cent, . . . . .	1	-	57 per cent, . . . . .	-	1
			60 per cent, . . . . .	4	10
<i>Chemical Preparations (Compounded).</i>	9	9	62 per cent, . . . . .	1	1
10 per cent, . . . . .	1	-	65 per cent, . . . . .	2	1
50 per cent, . . . . .	4	5	66 per cent, . . . . .	1	-
67 per cent, . . . . .	-	1	67 per cent, . . . . .	2	3
70 per cent, . . . . .	1	-	68 per cent, . . . . .	-	2
75 per cent, . . . . .	1	2	70 per cent, . . . . .	7	9
85 per cent, . . . . .	1	-	74 per cent, . . . . .	-	1
100 per cent, . . . . .	1	1	75 per cent, . . . . .	39	25
			80 per cent, . . . . .	7	11
<i>Clocks, Watches, and Jewelry.</i>	77	77	83 per cent, . . . . .	1	-
20 per cent, . . . . .	1	1	84 per cent, . . . . .	1	-
23 per cent, . . . . .	-	1	85 per cent, . . . . .	7	3
25 per cent, . . . . .	7	2	88 per cent, . . . . .	-	2
30 per cent, . . . . .	1	3	90 per cent, . . . . .	10	8
33 per cent, . . . . .	2	4	92 per cent, . . . . .	-	1
35 per cent, . . . . .	-	2	93 per cent, . . . . .	1	-
40 per cent, . . . . .	1	2	95 per cent, . . . . .	-	1
41 per cent, . . . . .	1	-	96 per cent, . . . . .	-	1
45 per cent, . . . . .	1	-	98 per cent, . . . . .	-	1
50 per cent, . . . . .	11	12	100 per cent, . . . . .	15	13
55 per cent, . . . . .	1	-			
60 per cent, . . . . .	2	5	<i>Cooking, Lighting, and Heating Apparatus.</i>	31	31
64 per cent, . . . . .	-	1	25 per cent, . . . . .	1	-
			33 per cent, . . . . .	1	-

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.

PERCENTAGES—1890, 1891—Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Cooking, Lighting, and Heating Apparatus—Con.</i>			<i>Cotton Goods—Con.</i>		
40 per cent, . . . . .	-	2	25 per cent, . . . . .	1	1
45 per cent, . . . . .	1	2	30 per cent, . . . . .	1	-
50 per cent, . . . . .	6	3	47 per cent, . . . . .	-	1
59 per cent, . . . . .	1	1	50 per cent, . . . . .	4	1
60 per cent, . . . . .	1	2	52 per cent, . . . . .	-	1
63 per cent, . . . . .	-	1	59 per cent, . . . . .	-	1
65 per cent, . . . . .	2	-	60 per cent, . . . . .	1	1
67 per cent, . . . . .	2	-	65 per cent, . . . . .	-	2
70 per cent, . . . . .	-	2	66 per cent, . . . . .	1	1
75 per cent, . . . . .	5	6	69 per cent, . . . . .	-	1
80 per cent, . . . . .	2	-	70 per cent, . . . . .	2	2
82 per cent, . . . . .	1	1	72 per cent, . . . . .	1	-
85 per cent, . . . . .	-	4	75 per cent, . . . . .	6	5
87 per cent, . . . . .	1	-	80 per cent, . . . . .	6	6
90 per cent, . . . . .	1	2	82 per cent, . . . . .	1	1
95 per cent, . . . . .	1	1	83 per cent, . . . . .	1	3
100 per cent, . . . . .	5	4	85 per cent, . . . . .	6	3
<i>Cordage and Twine.</i>	25	25	86 per cent, . . . . .	1	-
45 per cent, . . . . .	-	1	87 per cent, . . . . .	-	1
47 per cent, . . . . .	1	-	88 per cent, . . . . .	-	1
50 per cent, . . . . .	6	3	89 per cent, . . . . .	1	1
60 per cent, . . . . .	1	4	90 per cent, . . . . .	9	14
62 per cent, . . . . .	-	1	91 per cent, . . . . .	1	-
63 per cent, . . . . .	1	-	92 per cent, . . . . .	2	3
65 per cent, . . . . .	2	1	93 per cent, . . . . .	1	-
70 per cent, . . . . .	-	1	94 per cent, . . . . .	8	-
75 per cent, . . . . .	3	3	95 per cent, . . . . .	18	13
84 per cent, . . . . .	1	-	96 per cent, . . . . .	6	2
85 per cent, . . . . .	1	-	97 per cent, . . . . .	5	5
86 per cent, . . . . .	1	-	98 per cent, . . . . .	5	9
90 per cent, . . . . .	4	4	99 per cent, . . . . .	4	5
91 per cent, . . . . .	-	2	100 per cent, . . . . .	68	72
92 per cent, . . . . .	1	-	<i>Cotton, Woollen, and Other Textiles.</i>	3	3
98 per cent, . . . . .	1	-	12 per cent, . . . . .	1	-
100 per cent, . . . . .	2	5	15 per cent, . . . . .	-	1
<i>Corks, Bungs, and Taps.</i>	4	4	70 per cent, . . . . .	-	1
40 per cent, . . . . .	-	1	90 per cent, . . . . .	1	-
60 per cent, . . . . .	2	-	100 per cent, . . . . .	1	1
70 per cent, . . . . .	-	1	<i>Crayons, Pencils, Crucibles, etc.</i>	4	4
75 per cent, . . . . .	2	2	55 per cent, . . . . .	1	-
<i>Cotton Goods.</i>	157	157	60 per cent, . . . . .	1	-
12 per cent, . . . . .	-	1	65 per cent, . . . . .	-	2
15 per cent, . . . . .	1	-	66 per cent, . . . . .	-	1
23 per cent, . . . . .	1	-	80 per cent, . . . . .	1	-

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Crayons, Pencils, Crucibles, etc.</i> — Con.			<i>Electroplating — Con.</i>		
90 per cent, . . . .	-	1	25 per cent, . . . .	2	2
100 per cent, . . . .	1	-	50 per cent, . . . .	1	2
<i>Drugs and Medicines.</i>	19	19	70 per cent, . . . .	-	1
12 per cent, . . . .	1	-	75 per cent, . . . .	2	1
17 per cent, . . . .	-	1	83 per cent, . . . .	-	1
20 per cent, . . . .	-	1	85 per cent, . . . .	1	-
25 per cent, . . . .	2	1	88 per cent, . . . .	-	1
44 per cent, . . . .	-	1	90 per cent, . . . .	1	-
50 per cent, . . . .	8	5	91 per cent, . . . .	-	1
55 per cent, . . . .	-	1	100 per cent, . . . .	1	-
60 per cent, . . . .	1	-	<i>Emery and Sand Paper and</i> <i>Cloth, etc.</i>	18	13
62 per cent, . . . .	-	1	10 per cent, . . . .	1	-
63 per cent, . . . .	1	-	30 per cent, . . . .	1	-
67 per cent, . . . .	-	1	50 per cent, . . . .	2	2
75 per cent, . . . .	3	3	65 per cent, . . . .	-	2
80 per cent, . . . .	1	1	70 per cent, . . . .	1	1
100 per cent, . . . .	2	3	75 per cent, . . . .	-	2
<i>Dyestuffs.</i>	7	7	80 per cent, . . . .	2	-
50 per cent, . . . .	1	2	85 per cent, . . . .	1	1
60 per cent, . . . .	2	-	90 per cent, . . . .	1	2
66 per cent, . . . .	-	1	100 per cent, . . . .	4	3
67 per cent, . . . .	-	1	<i>Fancy Articles.</i>	6	6
68 per cent, . . . .	-	1	33 per cent, . . . .	1	-
70 per cent, . . . .	-	2	50 per cent, . . . .	-	2
75 per cent, . . . .	3	-	71 per cent, . . . .	1	-
88 per cent, . . . .	1	-	80 per cent, . . . .	-	1
<i>Earthen, Plaster, and Stone</i> <i>Ware.</i>	4	4	85 per cent, . . . .	2	1
80 per cent, . . . .	1	2	90 per cent, . . . .	-	1
85 per cent, . . . .	1	-	93 per cent, . . . .	-	1
90 per cent, . . . .	1	1	95 per cent, . . . .	2	-
100 per cent, . . . .	1	1	<i>Fertilizers.</i>	7	7
<i>Electrical Apparatus and</i> <i>Appliances.</i>	5	5	25 per cent, . . . .	1	1
40 per cent, . . . .	-	1	40 per cent, . . . .	-	1
50 per cent, . . . .	1	1	50 per cent, . . . .	2	2
60 per cent, . . . .	1	-	65 per cent, . . . .	1	-
67 per cent, . . . .	-	1	80 per cent, . . . .	1	-
75 per cent, . . . .	1	-	90 per cent, . . . .	1	1
100 per cent, . . . .	2	2	100 per cent, . . . .	1	2
<i>Electroplating.</i>	10	10	<i>Fine Arts and Taxidermy.</i>	2	2
10 per cent, . . . .	1	-	80 per cent, . . . .	-	1
20 per cent, . . . .	1	1	90 per cent, . . . .	-	1
			100 per cent, . . . .	2	-

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Fireworks and Matches.</i>	8	8	<i>Food Preparations — Con.</i>		
50 per cent, . . . . .	1	1	71 per cent, . . . . .	1	—
75 per cent, . . . . .	1	1	72 per cent, . . . . .	1	2
85 per cent, . . . . .	—	1	73 per cent, . . . . .	1	—
90 per cent, . . . . .	1	—	74 per cent, . . . . .	—	1
			75 per cent, . . . . .	47	50
<i>Flax, Hemp, Jute, and Linen Goods.</i>	8	8	78 per cent, . . . . .	—	1
50 per cent, . . . . .	—	1	79 per cent, . . . . .	1	—
60 per cent, . . . . .	1	—	80 per cent, . . . . .	15	13
62 per cent, . . . . .	1	—	82 per cent, . . . . .	—	1
66 per cent, . . . . .	—	1	83 per cent, . . . . .	1	—
70 per cent, . . . . .	—	1	84 per cent, . . . . .	1	—
75 per cent, . . . . .	1	—	85 per cent, . . . . .	6	5
80 per cent, . . . . .	—	1	89 per cent, . . . . .	1	—
90 per cent, . . . . .	1	—	90 per cent, . . . . .	8	13
96 per cent, . . . . .	1	—	91 per cent, . . . . .	—	1
97 per cent, . . . . .	—	1	95 per cent, . . . . .	—	1
98 per cent, . . . . .	1	—	96 per cent, . . . . .	1	1
100 per cent, . . . . .	2	3	97 per cent, . . . . .	1	—
			100 per cent, . . . . .	27	17
<i>Food Preparations.</i>	264	264	<i>Furniture.</i>	120	120
10 per cent, . . . . .	4	1	8 per cent, . . . . .	—	1
12 per cent, . . . . .	—	1	10 per cent, . . . . .	1	1
15 per cent, . . . . .	1	—	12 per cent, . . . . .	1	—
19 per cent, . . . . .	—	1	15 per cent, . . . . .	1	1
20 per cent, . . . . .	2	6	16 per cent, . . . . .	1	1
22 per cent, . . . . .	1	—	20 per cent, . . . . .	—	2
25 per cent, . . . . .	19	14	25 per cent, . . . . .	4	6
30 per cent, . . . . .	2	2	28 per cent, . . . . .	1	—
33 per cent, . . . . .	9	7	33 per cent, . . . . .	2	2
35 per cent, . . . . .	1	—	35 per cent, . . . . .	—	2
37 per cent, . . . . .	—	1	40 per cent, . . . . .	1	—
40 per cent, . . . . .	5	7	45 per cent, . . . . .	2	—
41 per cent, . . . . .	1	—	50 per cent, . . . . .	18	22
45 per cent, . . . . .	—	1	55 per cent, . . . . .	2	—
49 per cent, . . . . .	1	—	60 per cent, . . . . .	2	6
50 per cent, . . . . .	78	73	65 per cent, . . . . .	4	2
54 per cent, . . . . .	1	—	67 per cent, . . . . .	1	2
60 per cent, . . . . .	10	13	70 per cent, . . . . .	4	8
62 per cent, . . . . .	—	1	75 per cent, . . . . .	35	25
63 per cent, . . . . .	—	2	76 per cent, . . . . .	2	1
64 per cent, . . . . .	—	1	77 per cent, . . . . .	1	—
65 per cent, . . . . .	3	4	80 per cent, . . . . .	17	14
66 per cent, . . . . .	2	—	83 per cent, . . . . .	—	2
67 per cent, . . . . .	8	8	84 per cent, . . . . .	—	1
69 per cent, . . . . .	1	—	85 per cent, . . . . .	5	2
70 per cent, . . . . .	3	6	87 per cent, . . . . .	1	—

PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.  
 PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Furniture — Con.</i>			<i>Hosiery and Knit Goods — Con.</i>		
90 per cent, . . . . .	7	9	25 per cent, . . . . .	1	1
92 per cent, . . . . .	1	—	30 per cent, . . . . .	1	—
100 per cent, . . . . .	6	10	33 per cent, . . . . .	2	3
			35 per cent, . . . . .	1	1
<i>Glass.</i>	10	10	40 per cent, . . . . .	1	2
25 per cent, . . . . .	—	1	42 per cent, . . . . .	1	—
33 per cent, . . . . .	2	1	50 per cent, . . . . .	10	4
45 per cent, . . . . .	1	1	55 per cent, . . . . .	—	2
50 per cent, . . . . .	1	2	58 per cent, . . . . .	1	—
80 per cent, . . . . .	2	1	60 per cent, . . . . .	4	2
85 per cent, . . . . .	2	2	65 per cent, . . . . .	1	1
90 per cent, . . . . .	1	1	67 per cent, . . . . .	—	1
95 per cent, . . . . .	1	1	72 per cent, . . . . .	—	1
			75 per cent, . . . . .	7	8
<i>Glue, Isinglass, and Starch.</i>	14	14	79 per cent, . . . . .	1	—
40 per cent, . . . . .	—	1	80 per cent, . . . . .	5	2
50 per cent, . . . . .	3	1	84 per cent, . . . . .	—	1
65 per cent, . . . . .	1	—	86 per cent, . . . . .	—	1
75 per cent, . . . . .	3	2	89 per cent, . . . . .	—	1
77 per cent, . . . . .	1	1	90 per cent, . . . . .	—	1
78 per cent, . . . . .	1	1	99 per cent, . . . . .	—	1
80 per cent, . . . . .	—	1	100 per cent, . . . . .	4	4
83 per cent, . . . . .	—	1			
85 per cent, . . . . .	2	—	<i>Ink, Mucilage, and Paste.</i>	8	8
90 per cent, . . . . .	1	1	10 per cent, . . . . .	1	—
100 per cent, . . . . .	2	5	12 per cent, . . . . .	—	1
			20 per cent, . . . . .	1	1
<i>Hair Work (Animal and Human).</i>	10	10	40 per cent, . . . . .	1	1
10 per cent, . . . . .	1	—	50 per cent, . . . . .	1	1
33 per cent, . . . . .	1	1	60 per cent, . . . . .	1	1
45 per cent, . . . . .	—	1	75 per cent, . . . . .	2	2
50 per cent, . . . . .	4	4	80 per cent, . . . . .	—	1
75 per cent, . . . . .	2	2	100 per cent, . . . . .	1	—
100 per cent, . . . . .	2	2			
			<i>Ivory, Bone, Shell, and Horn Goods, etc.</i>	13	13
<i>Hose: Rubber, Linen, etc.</i>	5	5	50 per cent, . . . . .	1	1
15 per cent, . . . . .	—	1	60 per cent, . . . . .	1	—
25 per cent, . . . . .	1	—	62 per cent, . . . . .	—	1
27 per cent, . . . . .	1	—	67 per cent, . . . . .	2	—
50 per cent, . . . . .	1	1	75 per cent, . . . . .	3	5
75 per cent, . . . . .	1	1	79 per cent, . . . . .	1	—
95 per cent, . . . . .	1	—	80 per cent, . . . . .	1	1
100 per cent, . . . . .	—	2	85 per cent, . . . . .	—	1
			90 per cent, . . . . .	2	3
<i>Hosiery and Knit Goods.</i>	40	40	95 per cent, . . . . .	2	—
10 per cent, . . . . .	—	1	100 per cent, . . . . .	—	1
15 per cent, . . . . .	—	1			
20 per cent, . . . . .	—	1			

PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.  
 PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Leather.</i>	154	154	<i>Liquors and Beverages (Not Spirituos) — Con.</i>		
10 per cent, . . . . .	-	3	60 per cent, . . . . .	1	1
15 per cent, . . . . .	-	1	70 per cent, . . . . .	-	1
18 per cent, . . . . .	-	2	75 per cent, . . . . .	5	5
20 per cent, . . . . .	1	6	100 per cent, . . . . .	2	1
25 per cent, . . . . .	4	6	<i>Liquors: Malt, Distilled, and Fermented.</i>	49	49
30 per cent, . . . . .	-	3	10 per cent, . . . . .	1	-
33 per cent, . . . . .	4	-	13 per cent, . . . . .	2	-
35 per cent, . . . . .	-	8	15 per cent, . . . . .	-	2
37 per cent, . . . . .	1	-	20 per cent, . . . . .	1	-
38 per cent, . . . . .	1	-	25 per cent, . . . . .	6	7
40 per cent, . . . . .	1	5	27 per cent, . . . . .	1	-
45 per cent, . . . . .	1	3	30 per cent, . . . . .	2	-
46 per cent, . . . . .	-	1	32 per cent, . . . . .	-	1
50 per cent, . . . . .	27	21	33 per cent, . . . . .	1	-
55 per cent, . . . . .	-	1	35 per cent, . . . . .	1	-
56 per cent, . . . . .	1	-	50 per cent, . . . . .	9	11
57 per cent, . . . . .	1	-	55 per cent, . . . . .	1	-
58 per cent, . . . . .	-	1	57 per cent, . . . . .	1	-
60 per cent, . . . . .	6	8	60 per cent, . . . . .	4	3
62 per cent, . . . . .	1	-	61 per cent, . . . . .	-	1
63 per cent, . . . . .	1	-	65 per cent, . . . . .	1	-
64 per cent, . . . . .	1	-	67 per cent, . . . . .	1	1
65 per cent, . . . . .	4	3	70 per cent, . . . . .	2	1
66 per cent, . . . . .	1	2	71 per cent, . . . . .	-	1
67 per cent, . . . . .	4	8	73 per cent, . . . . .	1	1
70 per cent, . . . . .	10	5	74 per cent, . . . . .	1	1
72 per cent, . . . . .	1	-	75 per cent, . . . . .	8	7
74 per cent, . . . . .	1	-	80 per cent, . . . . .	2	2
75 per cent, . . . . .	28	26	84 per cent, . . . . .	-	1
78 per cent, . . . . .	-	3	89 per cent, . . . . .	-	1
80 per cent, . . . . .	11	7	90 per cent, . . . . .	-	2
83 per cent, . . . . .	1	-	95 per cent, . . . . .	1	1
84 per cent, . . . . .	-	1	100 per cent, . . . . .	2	5
85 per cent, . . . . .	7	5	<i>Lumber.</i>	25	25
88 per cent, . . . . .	-	1	25 per cent, . . . . .	-	1
90 per cent, . . . . .	11	8	33 per cent, . . . . .	1	-
92 per cent, . . . . .	1	-	40 per cent, . . . . .	1	1
95 per cent, . . . . .	4	3	50 per cent, . . . . .	5	2
96 per cent, . . . . .	-	1	55 per cent, . . . . .	-	1
100 per cent, . . . . .	20	16	67 per cent, . . . . .	1	-
<i>Liquors and Beverages (Not Spirituos).</i>	12	12	75 per cent, . . . . .	3	7
10 per cent, . . . . .	1	-	78 per cent, . . . . .	1	-
25 per cent, . . . . .	1	-	77 per cent, . . . . .	-	1
35 per cent, . . . . .	-	1	80 per cent, . . . . .	4	4
50 per cent, . . . . .	2	3	85 per cent, . . . . .	2	2

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Lumber—Con.</i>			<i>Machines and Machinery—Con.</i>		
88 per cent, . . . . .	1	1	91 per cent, . . . . .	1	—
90 per cent, . . . . .	2	—	92 per cent, . . . . .	—	1
98 per cent, . . . . .	1	—	98 per cent, . . . . .	1	—
100 per cent, . . . . .	8	5	95 per cent, . . . . .	4	6
			98 per cent, . . . . .	—	2
<i>Machines and Machinery.</i>	263	263	99 per cent, . . . . .	1	1
10 per cent, . . . . .	—	8	100 per cent, . . . . .	39	35
13 per cent, . . . . .	1	—			
15 per cent, . . . . .	1	3	<i>Metals and Metallic Goods.</i>	277	277
20 per cent, . . . . .	4	1	7 per cent, . . . . .	—	1
25 per cent, . . . . .	8	15	10 per cent, . . . . .	2	—
30 per cent, . . . . .	2	8	16 per cent, . . . . .	—	1
31 per cent, . . . . .	1	—	20 per cent, . . . . .	8	3
33 per cent, . . . . .	7	9	23 per cent, . . . . .	1	—
34 per cent, . . . . .	1	—	24 per cent, . . . . .	1	—
35 per cent, . . . . .	—	1	25 per cent, . . . . .	8	7
37 per cent, . . . . .	—	1	29 per cent, . . . . .	—	1
39 per cent, . . . . .	1	—	30 per cent, . . . . .	3	—
40 per cent, . . . . .	4	5	32 per cent, . . . . .	2	—
45 per cent, . . . . .	2	3	33 per cent, . . . . .	7	4
46 per cent, . . . . .	—	1	34 per cent, . . . . .	—	1
48 per cent, . . . . .	1	1	35 per cent, . . . . .	—	2
50 per cent, . . . . .	47	37	38 per cent, . . . . .	—	1
53 per cent, . . . . .	1	2	39 per cent, . . . . .	1	—
54 per cent, . . . . .	1	1	40 per cent, . . . . .	—	9
55 per cent, . . . . .	—	1	45 per cent, . . . . .	3	2
58 per cent, . . . . .	1	—	48 per cent, . . . . .	1	—
60 per cent, . . . . .	18	18	50 per cent, . . . . .	52	36
62 per cent, . . . . .	—	1	55 per cent, . . . . .	1	—
63 per cent, . . . . .	1	2	56 per cent, . . . . .	—	2
65 per cent, . . . . .	1	5	60 per cent, . . . . .	14	21
66 per cent, . . . . .	1	—	62 per cent, . . . . .	1	—
67 per cent, . . . . .	6	7	63 per cent, . . . . .	—	1
69 per cent, . . . . .	—	1	65 per cent, . . . . .	5	5
70 per cent, . . . . .	4	9	66 per cent, . . . . .	1	1
71 per cent, . . . . .	1	1	67 per cent, . . . . .	4	5
72 per cent, . . . . .	2	—	70 per cent, . . . . .	12	12
74 per cent, . . . . .	—	2	72 per cent, . . . . .	1	1
75 per cent, . . . . .	64	45	73 per cent, . . . . .	1	—
76 per cent, . . . . .	1	—	75 per cent, . . . . .	49	49
78 per cent, . . . . .	2	—	76 per cent, . . . . .	—	1
79 per cent, . . . . .	1	—	77 per cent, . . . . .	—	1
80 per cent, . . . . .	15	19	78 per cent, . . . . .	3	1
83 per cent, . . . . .	—	1	80 per cent, . . . . .	24	29
85 per cent, . . . . .	4	5	81 per cent, . . . . .	1	1
87 per cent, . . . . .	1	—	82 per cent, . . . . .	1	1
90 per cent, . . . . .	17	20	83 per cent, . . . . .	1	—

PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.  
 PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Metals and Metallic Goods—Con.</i>			<i>Musical Instruments and Materials—Con.</i>		
85 per cent, . . . . .	12	14	60 per cent, . . . . .	4	5
86 per cent, . . . . .	—	2	65 per cent, . . . . .	—	1
87 per cent, . . . . .	1	2	67 per cent, . . . . .	1	—
90 per cent, . . . . .	16	20	70 per cent, . . . . .	1	1
92 per cent, . . . . .	2	1	73 per cent, . . . . .	—	1
93 per cent, . . . . .	—	1	75 per cent, . . . . .	8	11
94 per cent, . . . . .	—	2	80 per cent, . . . . .	2	4
95 per cent, . . . . .	10	4	82 per cent, . . . . .	1	—
97 per cent, . . . . .	1	1	83 per cent, . . . . .	—	1
98 per cent, . . . . .	1	1	85 per cent, . . . . .	2	3
99 per cent, . . . . .	1	1	87 per cent, . . . . .	1	—
100 per cent, . . . . .	30	29	88 per cent, . . . . .	1	—
<i>Mixed Textiles.</i>	13	13	90 per cent, . . . . .	1	2
48 per cent, . . . . .	1	—	92 per cent, . . . . .	—	1
54 per cent, . . . . .	—	1	93 per cent, . . . . .	1	—
59 per cent, . . . . .	1	—	95 per cent, . . . . .	4	1
60 per cent, . . . . .	1	—	100 per cent, . . . . .	3	6
62 per cent, . . . . .	1	—	<i>Oils and Illuminating Fluids.</i>	9	9
70 per cent, . . . . .	1	—	25 per cent, . . . . .	—	1
72 per cent, . . . . .	—	1	40 per cent, . . . . .	—	1
75 per cent, . . . . .	—	1	50 per cent, . . . . .	1	—
80 per cent, . . . . .	—	2	55 per cent, . . . . .	—	1
81 per cent, . . . . .	1	—	60 per cent, . . . . .	—	1
87 per cent, . . . . .	—	1	63 per cent, . . . . .	—	1
90 per cent, . . . . .	—	1	65 per cent, . . . . .	1	—
92 per cent, . . . . .	1	1	66 per cent, . . . . .	—	1
95 per cent, . . . . .	1	—	70 per cent, . . . . .	1	—
100 per cent, . . . . .	5	5	75 per cent, . . . . .	6	2
<i>Models and Patterns.</i>	5	5	100 per cent, . . . . .	—	1
50 per cent, . . . . .	2	1	<i>Paints, Colors, and Crude Chemicals.</i>	16	16
60 per cent, . . . . .	—	1	10 per cent, . . . . .	—	1
80 per cent, . . . . .	1	1	15 per cent, . . . . .	—	1
85 per cent, . . . . .	1	—	20 per cent, . . . . .	2	—
88 per cent, . . . . .	—	1	50 per cent, . . . . .	4	2
100 per cent, . . . . .	1	1	55 per cent, . . . . .	—	1
<i>Musical Instruments and Materials.</i>	46	46	60 per cent, . . . . .	2	3
25 per cent, . . . . .	1	—	67 per cent, . . . . .	1	1
33 per cent, . . . . .	—	3	70 per cent, . . . . .	1	1
35 per cent, . . . . .	—	1	75 per cent, . . . . .	2	3
40 per cent, . . . . .	1	2	80 per cent, . . . . .	1	1
45 per cent, . . . . .	1	—	85 per cent, . . . . .	1	—
50 per cent, . . . . .	7	2	87 per cent, . . . . .	1	—
52 per cent, . . . . .	1	—	88 per cent, . . . . .	1	—
55 per cent, . . . . .	—	1	90 per cent, . . . . .	—	1
			95 per cent, . . . . .	—	1



## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Paper and Paper Goods.</i>	102	102	<i>Polishes and Dressing.</i>	18	18
10 per cent, . . . . .	-	1	23 per cent, . . . . .	1	-
13 per cent, . . . . .	1	-	25 per cent, . . . . .	-	1
25 per cent, . . . . .	1	1	30 per cent, . . . . .	-	1
33 per cent, . . . . .	1	-	33 per cent, . . . . .	1	-
40 per cent, . . . . .	1	-	50 per cent, . . . . .	3	4
50 per cent, . . . . .	9	7	60 per cent, . . . . .	2	1
57 per cent, . . . . .	-	1	65 per cent, . . . . .	-	2
60 per cent, . . . . .	2	2	70 per cent, . . . . .	2	1
65 per cent, . . . . .	1	1	75 per cent, . . . . .	2	-
67 per cent, . . . . .	1	2	80 per cent, . . . . .	-	1
70 per cent, . . . . .	5	3	85 per cent, . . . . .	1	1
71 per cent, . . . . .	-	1	90 per cent, . . . . .	2	1
75 per cent, . . . . .	11	11	95 per cent, . . . . .	-	1
76 per cent, . . . . .	-	1	96 per cent, . . . . .	-	1
80 per cent, . . . . .	5	5	100 per cent, . . . . .	4	3
81 per cent, . . . . .	1	1			
83 per cent, . . . . .	1	1	<i>Printing, Publishing, and Bookbinding.</i>	24	24
85 per cent, . . . . .	4	7	34 per cent, . . . . .	-	1
90 per cent, . . . . .	2	10	40 per cent, . . . . .	2	-
91 per cent, . . . . .	-	1	45 per cent, . . . . .	-	2
92 per cent, . . . . .	3	1	49 per cent, . . . . .	1	-
93 per cent, . . . . .	1	-	50 per cent, . . . . .	2	4
94 per cent, . . . . .	2	1	60 per cent, . . . . .	1	2
95 per cent, . . . . .	8	3	65 per cent, . . . . .	2	-
96 per cent, . . . . .	1	4	67 per cent, . . . . .	-	1
97 per cent, . . . . .	5	2	70 per cent, . . . . .	1	2
98 per cent, . . . . .	-	5	75 per cent, . . . . .	4	2
99 per cent, . . . . .	2	1	80 per cent, . . . . .	2	3
100 per cent, . . . . .	34	29	85 per cent, . . . . .	1	1
			87 per cent, . . . . .	1	-
<i>Perfumes, Toilet Articles, etc.</i>	4	4	90 per cent, . . . . .	4	3
75 per cent, . . . . .	2	-	91 per cent, . . . . .	-	1
80 per cent, . . . . .	-	1	98 per cent, . . . . .	1	-
85 per cent, . . . . .	-	1	100 per cent, . . . . .	2	2
90 per cent, . . . . .	-	1			
95 per cent, . . . . .	1	-	<i>Print Works, Dye Works, and Bleacheries.</i>	37	37
100 per cent, . . . . .	1	1	15 per cent, . . . . .	-	1
			20 per cent, . . . . .	1	-
<i>Photographs and Photographic Materials.</i>	11	11	25 per cent, . . . . .	1	3
40 per cent, . . . . .	-	1	50 per cent, . . . . .	7	7
50 per cent, . . . . .	1	2	60 per cent, . . . . .	3	2
60 per cent, . . . . .	-	1	63 per cent, . . . . .	1	-
75 per cent, . . . . .	4	2	65 per cent, . . . . .	-	2
85 per cent, . . . . .	-	1	67 per cent, . . . . .	-	1
90 per cent, . . . . .	2	2	70 per cent, . . . . .	2	2
100 per cent, . . . . .	4	2	75 per cent, . . . . .	8	5

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Print Works, Dye Works, and Bleacheries — Con.</i>			<i>Shipbuilding — Con.</i>		
80 per cent, . . . . .	2	1	25 per cent, . . . . .	2	3
82 per cent, . . . . .	—	2	30 per cent, . . . . .	—	1
90 per cent, . . . . .	2	4	33 per cent, . . . . .	1	1
95 per cent, . . . . .	—	1	34 per cent, . . . . .	1	—
100 per cent, . . . . .	10	6	37 per cent, . . . . .	—	1
			38 per cent, . . . . .	—	1
<i>Railroad Construction and Equipment.</i>	14	14	40 per cent, . . . . .	2	1
33 per cent, . . . . .	1	—	50 per cent, . . . . .	17	12
47 per cent, . . . . .	—	1	55 per cent, . . . . .	1	—
50 per cent, . . . . .	1	1	58 per cent, . . . . .	—	1
65 per cent, . . . . .	1	—	60 per cent, . . . . .	—	4
75 per cent, . . . . .	—	1	65 per cent, . . . . .	1	1
80 per cent, . . . . .	1	2	67 per cent, . . . . .	3	1
90 per cent, . . . . .	1	1	71 per cent, . . . . .	—	1
100 per cent, . . . . .	9	8	75 per cent, . . . . .	8	7
			79 per cent, . . . . .	—	1
<i>Rubber and Elastic Goods.</i>	30	30	80 per cent, . . . . .	—	1
15 per cent, . . . . .	—	1	90 per cent, . . . . .	—	1
25 per cent, . . . . .	—	3	100 per cent, . . . . .	1	1
30 per cent, . . . . .	—	1			
33 per cent, . . . . .	2	—	<i>Silk and Silk Goods.</i>	9	9
35 per cent, . . . . .	—	1	15 per cent, . . . . .	1	1
45 per cent, . . . . .	—	1	67 per cent, . . . . .	—	1
50 per cent, . . . . .	7	4	68 per cent, . . . . .	1	—
60 per cent, . . . . .	1	—	78 per cent, . . . . .	1	1
67 per cent, . . . . .	1	—	80 per cent, . . . . .	1	1
75 per cent, . . . . .	4	4	85 per cent, . . . . .	1	—
80 per cent, . . . . .	1	1	90 per cent, . . . . .	1	1
83 per cent, . . . . .	1	—	95 per cent, . . . . .	2	1
85 per cent, . . . . .	4	3	100 per cent, . . . . .	1	3
90 per cent, . . . . .	5	5			
93 per cent, . . . . .	—	1	<i>Sporting and Athletic Goods.</i>	9	9
95 per cent, . . . . .	—	3	10 per cent, . . . . .	—	1
100 per cent, . . . . .	4	2	20 per cent, . . . . .	1	—
			33 per cent, . . . . .	1	1
<i>Scientific Instruments and Appliances.</i>	11	11	42 per cent, . . . . .	—	1
25 per cent, . . . . .	1	1	50 per cent, . . . . .	2	2
50 per cent, . . . . .	2	3	66 per cent, . . . . .	1	—
60 per cent, . . . . .	1	1	70 per cent, . . . . .	1	—
75 per cent, . . . . .	4	1	75 per cent, . . . . .	2	2
80 per cent, . . . . .	—	2	90 per cent, . . . . .	—	1
100 per cent, . . . . .	3	3	100 per cent, . . . . .	1	1
<i>Shipbuilding.</i>	42	42	<i>Stone.</i>	111	111
10 per cent, . . . . .	2	1	10 per cent, . . . . .	1	1
15 per cent, . . . . .	2	1	15 per cent, . . . . .	1	1
20 per cent, . . . . .	1	1	20 per cent, . . . . .	2	3

PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.  
 PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Stone — Con.</i>			<i>Tallow, Candles, Soap, and Grease.</i>	55	55
25 per cent. . . . .	10	9	10 per cent. . . . .	1	—
30 per cent. . . . .	1	2	12 per cent. . . . .	—	1
31 per cent. . . . .	1	—	20 per cent. . . . .	—	1
33 per cent. . . . .	5	2	25 per cent. . . . .	2	3
34 per cent. . . . .	—	1	33 per cent. . . . .	—	1
35 per cent. . . . .	2	1	38 per cent. . . . .	1	—
40 per cent. . . . .	2	—	50 per cent. . . . .	10	14
45 per cent. . . . .	—	1	51 per cent. . . . .	1	—
50 per cent. . . . .	24	20	60 per cent. . . . .	2	4
52 per cent. . . . .	—	1	62 per cent. . . . .	—	2
54 per cent. . . . .	1	—	67 per cent. . . . .	1	—
55 per cent. . . . .	—	1	70 per cent. . . . .	5	6
57 per cent. . . . .	1	—	75 per cent. . . . .	13	9
60 per cent. . . . .	2	8	80 per cent. . . . .	6	3
61 per cent. . . . .	—	1	85 per cent. . . . .	2	5
62 per cent. . . . .	2	—	90 per cent. . . . .	3	2
63 per cent. . . . .	1	—	95 per cent. . . . .	1	1
64 per cent. . . . .	—	1	100 per cent. . . . .	7	8
65 per cent. . . . .	1	1	<i>Tobacco, Snuff, and Cigars.</i>	35	35
66 per cent. . . . .	1	1	16 per cent. . . . .	—	1
67 per cent. . . . .	1	4	20 per cent. . . . .	2	—
70 per cent. . . . .	2	5	25 per cent. . . . .	1	1
72 per cent. . . . .	2	2	30 per cent. . . . .	1	—
75 per cent. . . . .	19	14	33 per cent. . . . .	—	1
80 per cent. . . . .	11	12	35 per cent. . . . .	1	—
84 per cent. . . . .	1	—	41 per cent. . . . .	1	—
85 per cent. . . . .	3	7	45 per cent. . . . .	1	—
88 per cent. . . . .	1	—	50 per cent. . . . .	4	6
90 per cent. . . . .	4	2	52 per cent. . . . .	1	—
95 per cent. . . . .	1	1	55 per cent. . . . .	—	1
99 per cent. . . . .	—	1	60 per cent. . . . .	1	4
100 per cent. . . . .	8	8	62 per cent. . . . .	—	1
<i>Straw and Pa'm Leaf Goods.</i>	17	17	65 per cent. . . . .	3	—
42 per cent. . . . .	1	—	66 per cent. . . . .	1	—
50 per cent. . . . .	4	4	67 per cent. . . . .	1	2
60 per cent. . . . .	2	—	70 per cent. . . . .	3	—
65 per cent. . . . .	—	2	75 per cent. . . . .	5	4
67 per cent. . . . .	1	—	80 per cent. . . . .	2	4
70 per cent. . . . .	2	1	85 per cent. . . . .	1	1
75 per cent. . . . .	3	4	90 per cent. . . . .	2	2
80 per cent. . . . .	1	1	95 per cent. . . . .	1	—
83 per cent. . . . .	—	1	100 per cent. . . . .	3	7
85 per cent. . . . .	—	1	<i>Toys and Games (Children's).</i>	8	8
90 per cent. . . . .	2	2	50 per cent. . . . .	1	1
100 per cent. . . . .	1	1	55 per cent. . . . .	1	—

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Toys and Games (Children's)</i> — Con.			<i>Wooden Goods — Con.</i>		
62 per cent, . . . . .	—	1	65 per cent, . . . . .	3	4
65 per cent, . . . . .	1	—	66 per cent, . . . . .	—	1
70 per cent, . . . . .	—	1	67 per cent, . . . . .	7	2
75 per cent, . . . . .	3	—	68 per cent, . . . . .	1	—
80 per cent, . . . . .	—	2	70 per cent, . . . . .	3	11
85 per cent, . . . . .	1	1	72 per cent, . . . . .	—	1
87 per cent, . . . . .	1	—	74 per cent, . . . . .	1	—
90 per cent, . . . . .	—	1	75 per cent, . . . . .	37	24
100 per cent, . . . . .	—	1	80 per cent, . . . . .	10	8
			85 per cent, . . . . .	4	4
<i>Trunks and Valises.</i>	7	7	90 per cent, . . . . .	3	6
50 per cent, . . . . .	1	—	95 per cent, . . . . .	2	—
75 per cent, . . . . .	2	3	100 per cent, . . . . .	17	15
80 per cent, . . . . .	3	2			
85 per cent, . . . . .	1	1	<i>Woollen Goods.</i>	138	138
100 per cent, . . . . .	—	1	10 per cent, . . . . .	1	—
			12 per cent, . . . . .	—	1
<i>Whips, Lashes, and Stocks.</i>	15	15	15 per cent, . . . . .	1	—
50 per cent, . . . . .	4	2	20 per cent, . . . . .	1	1
60 per cent, . . . . .	1	—	25 per cent, . . . . .	2	2
65 per cent, . . . . .	1	2	30 per cent, . . . . .	1	—
67 per cent, . . . . .	1	1	33 per cent, . . . . .	—	3
70 per cent, . . . . .	1	—	50 per cent, . . . . .	11	6
75 per cent, . . . . .	2	5	56 per cent, . . . . .	—	1
80 per cent, . . . . .	1	—	58 per cent, . . . . .	1	—
90 per cent, . . . . .	2	1	60 per cent, . . . . .	7	4
100 per cent, . . . . .	2	4	62 per cent, . . . . .	1	—
			65 per cent, . . . . .	2	—
<i>Wooden Goods.</i>	149	149	66 per cent, . . . . .	—	1
5 per cent, . . . . .	1	—	67 per cent, . . . . .	3	3
8 per cent, . . . . .	—	1	70 per cent, . . . . .	2	5
10 per cent, . . . . .	2	2	74 per cent, . . . . .	—	1
20 per cent, . . . . .	4	4	75 per cent, . . . . .	12	14
25 per cent, . . . . .	7	11	80 per cent, . . . . .	7	8
30 per cent, . . . . .	—	1	82 per cent, . . . . .	1	—
33 per cent, . . . . .	4	7	83 per cent, . . . . .	—	1
35 per cent, . . . . .	2	—	85 per cent, . . . . .	4	7
37 per cent, . . . . .	—	1	87 per cent, . . . . .	2	—
40 per cent, . . . . .	3	2	88 per cent, . . . . .	—	2
42 per cent, . . . . .	1	—	89 per cent, . . . . .	1	1
45 per cent, . . . . .	2	—	90 per cent, . . . . .	16	6
50 per cent, . . . . .	29	35	92 per cent, . . . . .	4	3
51 per cent, . . . . .	1	—	93 per cent, . . . . .	—	1
55 per cent, . . . . .	1	—	94 per cent, . . . . .	2	2
60 per cent, . . . . .	3	8	95 per cent, . . . . .	3	8
62 per cent, . . . . .	1	—	96 per cent, . . . . .	2	1
63 per cent, . . . . .	—	1	97 per cent, . . . . .	—	3

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		INDUSTRIES, AND PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
<i>Woolen Goods — Con.</i>			<i>Worsted Goods — Con.</i>		
98 per cent, . . . . .	2	-	75 per cent, . . . . .	-	1
100 per cent, . . . . .	49	53	80 per cent, . . . . .	1	1
<i>Worsted Goods.</i>			85 per cent, . . . . .	1	-
33 per cent, . . . . .	-	1	87 per cent, . . . . .	2	-
60 per cent, . . . . .	1	-	90 per cent, . . . . .	1	2
65 per cent, . . . . .	-	2	91 per cent, . . . . .	-	1
67 per cent, . . . . .	2	-	95 per cent, . . . . .	2	1
70 per cent, . . . . .	2	1	100 per cent, . . . . .	9	11

## ALL INDUSTRIES.

PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
5 per cent, . . . . .	2	-	41 per cent, . . . . .	3	-
6 per cent, . . . . .	-	1	42 per cent, . . . . .	5	1
7 per cent, . . . . .	-	1	43 per cent, . . . . .	-	2
8 per cent, . . . . .	-	2	44 per cent, . . . . .	-	1
10 per cent, . . . . .	28	29	45 per cent, . . . . .	18	24
12 per cent, . . . . .	4	6	46 per cent, . . . . .	-	2
13 per cent, . . . . .	6	1	47 per cent, . . . . .	1	2
15 per cent, . . . . .	12	17	48 per cent, . . . . .	4	1
16 per cent, . . . . .	1	4	49 per cent, . . . . .	2	1
17 per cent, . . . . .	2	2	50 per cent, . . . . .	654	577
18 per cent, . . . . .	1	3	51 per cent, . . . . .	2	-
19 per cent, . . . . .	1	1	52 per cent, . . . . .	2	2
20 per cent, . . . . .	38	45	53 per cent, . . . . .	2	2
22 per cent, . . . . .	1	-	54 per cent, . . . . .	3	3
23 per cent, . . . . .	3	1	55 per cent, . . . . .	12	17
24 per cent, . . . . .	1	1	56 per cent, . . . . .	2	3
25 per cent, . . . . .	132	145	57 per cent, . . . . .	4	5
27 per cent, . . . . .	2	-	58 per cent, . . . . .	4	5
28 per cent, . . . . .	1	1	59 per cent, . . . . .	3	2
29 per cent, . . . . .	-	1	60 per cent, . . . . .	150	204
30 per cent, . . . . .	19	29	61 per cent, . . . . .	-	2
31 per cent, . . . . .	2	-	62 per cent, . . . . .	13	19
32 per cent, . . . . .	2	1	63 per cent, . . . . .	10	13
33 per cent, . . . . .	80	84	64 per cent, . . . . .	2	5
34 per cent, . . . . .	2	3	65 per cent, . . . . .	62	75
35 per cent, . . . . .	12	18	66 per cent, . . . . .	16	14
37 per cent, . . . . .	2	5	67 per cent, . . . . .	92	90
38 per cent, . . . . .	4	3	68 per cent, . . . . .	3	7
39 per cent, . . . . .	3	-	69 per cent, . . . . .	1	3
40 per cent, . . . . .	36	63	70 per cent, . . . . .	120	160

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

ALL INDUSTRIES — Concluded.

PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS		PROPORTION OF BUSINESS DONE.	ESTAB- LISHMENTS	
	1890	1891		1890	1891
71 per cent, . . . .	3	4	87 per cent, . . . .	16	4
72 per cent, . . . .	11	9	88 per cent, . . . .	8	11
73 per cent, . . . .	3	2	89 per cent, . . . .	3	6
74 per cent, . . . .	4	6	90 per cent, . . . .	218	240
75 per cent, . . . .	707	625	91 per cent, . . . .	4	8
76 per cent, . . . .	7	4	92 per cent, . . . .	17	14
77 per cent, . . . .	3	7	93 per cent, . . . .	6	6
78 per cent, . . . .	8	10	94 per cent, . . . .	12	6
79 per cent, . . . .	4	1	95 per cent, . . . .	81	78
80 per cent, . . . .	261	265	96 per cent, . . . .	14	13
81 per cent, . . . .	4	2	97 per cent, . . . .	15	12
82 per cent, . . . .	7	7	98 per cent, . . . .	14	19
83 per cent, . . . .	9	15	99 per cent, . . . .	9	10
84 per cent, . . . .	4	5	100 per cent, . . . .	574	522
85 per cent, . . . .	127	121	TOTALS, . . . .	3,745	3,745
86 per cent, . . . .	3	4			

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Continued.

## RECAPITULATION. PERCENTAGES — 1890, 1891.

INDUSTRIES.	AVERAGE PROPORTION OF BUSINESS DONE			
	1890		1891	
	Estab- lishments	Per- centages	Estab- lishments	Per- centages
Agricultural implements, . . . . .	11	60.36	11	56.73
Arms and ammunition, . . . . .	12	63.33	12	68.17
Artisans' tools, . . . . .	56	68.73	56	66.43
Awning, sails, tents, etc., . . . . .	80	50.37	80	48.67
Boots and shoes, . . . . .	567	70.21	567	66.06
Boxes (paper and wooden), . . . . .	141	69.39	141	67.22
Brick, tiles, and sewer pipe, . . . . .	45	77.09	45	81.98
Brooms, brushes, and mops, . . . . .	21	61.57	21	64.43
Burial cases, caskets, coffins, etc., . . . . .	6	78.33	6	85.00
Buttons and dress trimmings, . . . . .	17	61.65	17	64.29
Carpetings, . . . . .	12	78.25	12	80.83
Carriages and wagons, . . . . .	96	70.06	96	67.50
Cement, kaolin, lime, and plaster, . . . . .	4	76.50	4	78.50
Chemical preparations (compounded), . . . . .	9	60.00	9	63.00
Clocks, watches, and jewelry, . . . . .	77	66.30	77	63.90
Clothing, . . . . .	113	75.51	113	72.88
Cooking, lighting, and heating apparatus, . . . . .	31	70.16	31	72.55
Cordage and twine, . . . . .	25	73.20	25	75.96
Corks, bungs, and taps, . . . . .	4	67.50	4	65.00
Cotton goods, . . . . .	157	91.23	157	91.97
Cotton, woollen, and other textiles, . . . . .	3	67.33	3	61.67
Crayons, pencils, crucibles, etc., . . . . .	4	73.75	4	71.50
Drugs and medicines, . . . . .	19	57.37	19	60.26
Dyestuffs, . . . . .	7	69.00	7	63.00
Earthen, plaster, and stone ware, . . . . .	4	88.75	4	87.50
Electrical apparatus and appliances, . . . . .	5	77.00	5	71.40
Electroplating, . . . . .	10	55.50	10	57.70
Emery and sand paper and cloth, etc., . . . . .	13	72.69	13	78.08
Fancy articles, . . . . .	6	77.33	6	74.67
Fertilizers, . . . . .	7	65.71	7	65.00
Fine arts and taxidermy, . . . . .	2	100.00	2	85.00
Fireworks and matches, . . . . .	3	71.67	3	70.00
Flax, hemp, jute, and linen goods, . . . . .	8	85.13	8	84.00
Food preparations, . . . . .	264	62.00	264	62.43
Furniture, . . . . .	120	68.02	120	66.33
Glass, . . . . .	10	67.60	10	63.80
Glue, isinglass, and starch, . . . . .	14	75.36	14	82.00
Hair work (animal and human), . . . . .	10	59.30	10	62.80
Hose: rubber, linen, etc., . . . . .	5	54.40	5	68.00
Hosiery and knit goods, . . . . .	40	62.68	40	63.15
Ink, mucilage, and paste, . . . . .	8	53.75	8	51.50
Ivory, bone, shell, and horn goods, etc., . . . . .	13	76.77	13	78.62
Leather, . . . . .	154	70.71	154	64.42
Liquors and beverages (not spirituous), . . . . .	12	64.17	12	65.83
Liquors: malt, distilled, and fermented, . . . . .	49	53.82	49	61.55
Lumber, . . . . .	25	73.88	25	76.00

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

PERCENTAGES — 1890, 1891 — Concluded.

RECAPITULATION. PERCENTAGES — 1890, 1891 — Concluded.

INDUSTRIES.	AVERAGE PROPORTION OF BUSINESS DONE			
	1890		1891	
	Estab- lishments	Per- centages	Estab- lishments	Per- centages
Machines and machinery, . . . . .	263	69.27	263	67.54
Metals and metallic goods, . . . . .	277	69.26	277	70.60
Mixed textiles, . . . . .	13	82.08	13	86.92
Models and patterns, . . . . .	5	73.00	5	75.60
Musical instruments and materials, . . . . .	46	74.76	46	72.33
Oils and illuminating fluids, . . . . .	9	70.56	9	62.11
Paints, colors, and crude chemicals, . . . . .	16	61.69	16	61.69
Paper and paper goods, . . . . .	102	84.00	102	84.62
Perfumes, toilet articles, etc., . . . . .	4	86.25	4	88.75
Photographs and photographic materials, . . . . .	11	84.55	11	74.09
Pollaxes and dressing, . . . . .	18	71.17	18	70.06
Printing, publishing, and bookbinding, . . . . .	24	74.13	24	70.29
Print works, dye works, and bleacheries, . . . . .	37	73.46	37	69.49
Railroad construction and equipment, . . . . .	14	87.00	14	87.29
Rubber and elastic goods, . . . . .	30	73.20	30	68.77
Scientific instruments and appliances, . . . . .	11	71.36	11	70.00
Shipbuilding, . . . . .	42	50.90	42	54.12
Silk and silk goods, . . . . .	9	78.44	9	80.56
Sporting and athletic goods, . . . . .	9	59.89	9	58.33
Stone, . . . . .	111	61.06	111	62.47
Straw and palm leaf goods, . . . . .	17	67.88	17	72.24
Tallow, candles, soap, and grease, . . . . .	55	70.47	55	64.35
Tobacco, snuff, and cigars, . . . . .	35	64.60	35	70.00
Toys and games (children's), . . . . .	8	70.88	8	77.13
Trunks and valises, . . . . .	7	75.00	7	81.43
Whips, lashes, and stocks, . . . . .	15	71.47	15	77.47
Wooden goods, . . . . .	149	64.58	149	61.58
Woollen goods, . . . . .	138	82.61	138	84.88
Worsted goods, . . . . .	21	88.24	21	88.29
ALL INDUSTRIES, . . . . .	3,745	70.27	3,745	69.27



## PROPORTION OF BUSINESS DONE: BY INDUSTRIES.

[In this presentation, the number of days each establishment considered was in operation is shown, together with the aggregate average number of persons employed in such establishments during the specified number of days for the years 1890 and 1891.]

### DAYS IN OPERATION—1890, 1891.

#### AGRICULTURAL IMPLEMENTS.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
150 days, .	1	1	1	1	277 days, .	1	180	-	-
208 days, .	-	-	1	3	300 days, .	1	70	2	335
229 days, .	1	20	1	24	303 days, .	1	307	-	-
240 days, .	1	1	1	1	304 days, .	1	5	-	-
250 days, .	-	-	1	59	306 days, .	1	4	1	4
255 days, .	1	1	-	-	307 days, .	-	-	1	84
260 days, .	-	-	1	1	308 days, .	1	83	-	-
267 days, .	-	-	1	165					
275 days, .	1	19	-	-	TOTALS, .	11	691	11	677

#### ARMS AND AMMUNITION.

275 days, .	1	29	-	-	304 days, .	-	-	1	204
280 days, .	-	-	1	32	306 days, .	3	179	3	192
290 days, .	-	-	1	425	308 days, .	1	26	-	-
291 days, .	-	-	1	32	309 days, .	-	-	1	56
299 days, .	1	483	-	-	312 days, .	1	53	-	-
300 days, .	5	1,082	3	661					
302 days, .	-	-	1	494	TOTALS, .	12	1,852	12	2,006

#### ARTISANS' TOOLS.

78 days, .	-	-	1	1	250 days, .	1	229	1	1
113 days, .	-	-	1	5	256 days, .	-	-	1	3
150 days, .	-	-	1	5	260 days, .	-	-	2	5
215 days, .	-	-	1	1	265 days, .	-	-	1	2
226 days, .	1	1	-	-	268 days, .	-	-	1	4
240 days, .	2	5	-	-	270 days, .	1	14	-	-
246 days, .	1	23	-	-	274 days, .	-	-	1	2

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## ARTISANS' TOOLS — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
275 days, .	2	95	2	114	304 days, .	2	370	2	94
280 days, .	1	4	2	21	305 days, .	1	6	3	55
290 days, .	-	-	1	217	306 days, .	20	412	17	382
292 days, .	1	3	-	-	307 days, .	1	11	1	20
294 days, .	-	-	1	98	309 days, .	2	107	1	11
296 days, .	1	37	-	-	310 days, .	1	49	-	-
298 days, .	-	-	1	200	312 days, .	1	16	-	-
300 days, .	12	69	12	113	313 days, .	1	5	-	-
301 days, .	-	-	1	59	TOTALS, .	56	1,676	56	1,685
302 days, .	3	205	-	-					
303 days, .	1	15	1	272					

## AWNINGS, SAILS, TENTS, ETC.

18 days, .	-	-	1	1	260 days, .	1	1	1	2
60 days, .	1	1	-	-	276 days, .	1	3	-	-
108 days, .	-	-	1	1	290 days, .	1	10	-	-
125 days, .	-	-	1	1	300 days, .	2	5	3	9
140 days, .	-	-	1	1	301 days, .	-	-	1	5
150 days, .	1	1	1	2	304 days, .	1	5	-	-
180 days, .	2	5	1	3	306 days, .	15	85	15	108
200 days, .	2	9	3	12	307 days, .	1	27	-	-
228 days, .	1	1	-	-	TOTALS, .	30	135	30	149
240 days, .	-	-	1	4					
250 days, .	1	2	-	-					

## BOOTS AND SHOES.

80 days, .	-	-	1	1	174 days, .	1	66	-	-
100 days, .	1	33	2	14	175 days, .	-	-	1	1
104 days, .	-	-	1	3	176 days, .	-	-	1	3
110 days, .	-	-	1	18	179 days, .	1	2	-	-
120 days, .	1	1	-	-	180 days, .	2	7	1	44
121 days, .	1	99	-	-	182 days, .	-	-	1	2
125 days, .	-	-	1	4	183 days, .	-	-	1	362
130 days, .	1	2	1	11	190 days, .	-	-	1	10
136 days, .	1	2	-	-	195 days, .	-	-	1	20
137 days, .	1	81	-	-	197 days, .	-	-	1	75
140 days, .	-	-	1	2	200 days, .	7	321	7	179
144 days, .	1	3	-	-	204 days, .	1	9	-	-
150 days, .	4	54	2	5	205 days, .	-	-	1	3
153 days, .	2	4	-	-	209 days, .	1	45	-	-
154 days, .	-	-	1	3	210 days, .	-	-	1	28
160 days, .	1	4	1	3	213 days, .	-	-	1	44

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## BOOTS AND SHOES — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab-lish-ments	Persons Em-ployed	Estab-lish-ments	Persons Em-ployed		Estab-lish-ments	Persons Em-ployed	Estab-lish-ments	Persons Em-ployed
214 days, .	1	11	-	-	271 days, .	-	-	1	16
215 days, .	1	25	1	72	272 days, .	-	-	1	26
216 days, .	1	3	-	-	274 days, .	1	17	-	-
217 days, .	-	-	1	16	275 days, .	18	609	17	1,088
219 days, .	1	20	-	-	276 days, .	2	43	2	476
220 days, .	1	3	2	38	278 days, .	2	350	3	363
225 days, .	3	56	5	190	280 days, .	17	1,914	16	1,216
226 days, .	-	-	1	14	281 days, .	2	161	2	59
227 days, .	-	-	1	99	282 days, .	5	570	5	593
228 days, .	1	119	1	219	283 days, .	3	303	-	-
229 days, .	-	-	1	75	284 days, .	2	202	1	183
230 days, .	4	399	3	307	285 days, .	6	392	9	1,594
231 days, .	1	70	1	29	286 days, .	3	376	2	173
233 days, .	1	20	1	43	287 days, .	2	516	3	401
234 days, .	2	30	1	2	288 days, .	6	711	6	420
235 days, .	2	69	1	86	289 days, .	2	298	1	5
237 days, .	1	79	-	-	290 days, .	25	2,875	18	2,261
239 days, .	2	87	-	-	291 days, .	4	990	1	47
240 days, .	9	867	9	739	292 days, .	1	36	3	206
244 days, .	1	53	2	199	293 days, .	-	-	2	239
245 days, .	-	-	2	148	294 days, .	11	1,316	8	1,063
246 days, .	1	183	1	15	295 days, .	5	525	11	2,010
248 days, .	1	21	2	71	296 days, .	2	137	1	342
250 days, .	17	675	10	388	297 days, .	4	248	-	-
252 days, .	2	195	1	192	298 days, .	6	380	7	1,220
253 days, .	-	-	1	95	299 days, .	1	80	3	178
254 days, .	1	36	1	103	300 days, .	98	9,181	91	6,997
255 days, .	4	492	3	283	301 days, .	6	1,111	1	37
256 days, .	1	6	1	64	302 days, .	2	1,011	1	114
257 days, .	-	-	1	55	303 days, .	6	1,073	7	830
258 days, .	-	-	2	119	304 days, .	11	1,252	6	1,539
260 days, .	11	1,314	13	740	305 days, .	10	1,152	4	1,614
261 days, .	1	76	-	-	306 days, .	181	8,610	212	10,638
262 days, .	1	186	1	178	307 days, .	1	32	1	160
263 days, .	1	83	2	142	308 days, .	2	373	2	216
264 days, .	3	298	-	-	309 days, .	1	7	1	6
265 days, .	4	245	2	105	310 days, .	2	9	1	8
266 days, .	1	208	1	128	313 days, .	2	5	1	1
267 days, .	1	22	1	78	315 days, .	1	3	-	-
268 days, .	-	-	1	155					
269 days, .	-	-	1	209	TOTALS, .	567	44,068	567	43,343
270 days, .	5	516	8	773					

## BOXES (PAPER AND WOODEN).

75 days, .	1	1	1	2	140 days, .	1	4	-	-
135 days, .	-	-	1	4	150 days, .	-	-	1	6

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

BOXES (PAPER AND WOODEN) — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
153 days, .	-	-	1	12	286 days, .	1	30	-	-
154 days, .	-	-	2	3	287 days, .	1	18	2	37
168 days, .	-	-	1	17	289 days, .	1	19	1	11
184 days, .	-	-	1	5	290 days, .	5	90	7	100
200 days, .	3	21	3	10	291 days, .	1	11	-	-
202 days, .	1	4	-	-	292 days, .	1	2	1	2
220 days, .	1	4	1	4	293 days, .	1	12	-	-
225 days, .	1	10	-	-	294 days, .	2	61	1	62
227 days, .	-	-	1	8	295 days, .	1	12	2	30
228 days, .	1	36	-	-	296 days, .	3	73	-	-
230 days, .	1	12	2	26	297 days, .	4	227	-	-
231 days, .	1	26	1	23	298 days, .	2	61	2	95
232 days, .	-	-	1	7	299 days, .	2	139	1	55
234 days, .	-	-	1	8	300 days, .	29	690	32	835
235 days, .	-	-	1	31	301 days, .	-	-	1	10
240 days, .	3	28	2	38	302 days, .	1	5	2	88
243 days, .	-	-	1	12	303 days, .	5	122	1	32
250 days, .	2	77	4	42	304 days, .	1	27	1	28
256 days, .	1	3	-	-	305 days, .	2	83	1	16
260 days, .	4	78	4	88	306 days, .	40	986	35	901
270 days, .	-	-	4	103	307 days, .	2	30	2	20
273 days, .	-	-	1	100	308 days, .	1	13	-	-
275 days, .	6	138	4	39	309 days, .	1	26	-	-
278 days, .	-	-	1	42	310 days, .	-	-	1	66
279 days, .	1	5	-	-	313 days, .	1	9	-	-
280 days, .	4	30	4	52	315 days, .	-	-	1	63
281 days, .	-	-	1	18					
285 days, .	1	5	2	19	TOTALS, .	141	3,228	141	3,170

## BRICK, TILES, AND SEWER PIPE.

65 days, .	1	5	-	-	165 days, .	2	64	1	31
100 days, .	1	13	-	-	172 days, .	1	82	-	-
117 days, .	-	-	1	4	174 days, .	-	-	1	19
130 days, .	1	25	1	43	175 days, .	-	-	1	23
140 days, .	1	11	-	-	179 days, .	-	-	2	87
143 days, .	2	23	-	-	180 days, .	4	107	1	33
149 days, .	-	-	1	9	182 days, .	1	11	2	26
150 days, .	2	35	6	100	185 days, .	1	18	-	-
153 days, .	2	28	1	41	190 days, .	-	-	1	18
154 days, .	1	24	3	42	195 days, .	-	-	1	22
155 days, .	-	-	1	21	200 days, .	1	10	2	36
156 days, .	3	68	1	8	205 days, .	2	41	-	-
160 days, .	2	33	-	-	210 days, .	-	-	1	39
162 days, .	1	28	1	17	224 days, .	-	-	1	32
163 days, .	-	-	1	25	231 days, .	-	-	1	9

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

BRICK, TILES, AND SEWER PIPE — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
240 days, .	1	16	1	16	302 days, .	-	-	1	20
250 days, .	-	-	1	47	303 days, .	-	-	2	86
260 days, .	1	32	-	-	306 days, .	8	362	5	270
266 days, .	-	-	1	16	308 days, .	1	56	1	60
270 days, .	1	14	-	-	310 days, .	1	16	-	-
280 days, .	-	-	1	14	312 days, .	1	13	-	-
300 days, .	2	35	-	-	TOTALS, .	46	1,170	45	1,214

## BROOMS, BRUSHES, AND MOPS.

100 days, .	1	1	1	2	291 days, .	1	80	-	-
123 days, .	-	-	1	1	296 days, .	-	-	1	16
247 days, .	-	-	1	4	298 days, .	-	-	1	13
250 days, .	1	5	1	4	300 days, .	1	11	-	-
270 days, .	1	1	-	-	306 days, .	12	578	12	621
275 days, .	1	43	-	-	307 days, .	1	34	-	-
276 days, .	-	-	1	5	308 days, .	1	4	-	-
281 days, .	-	-	1	40	310 days, .	1	5	-	-
285 days, .	-	-	1	84	TOTALS, .	21	762	21	790

## BURIAL CASES, CASKETS, COFFINS, ETC.

300 days, .	-	-	1	1	309 days, .	-	-	1	6
303 days, .	1	21	-	-	310 days, .	1	4	-	-
306 days, .	4	184	4	215	TOTALS, .	6	209	6	222

## BUTTONS AND DRESS TRIMMINGS.

259 days, .	-	-	1	3	301 days, .	1	3	1	24
270 days, .	1	5	1	4	302 days, .	-	-	1	135
275 days, .	1	89	1	74	303 days, .	1	127	-	-
284 days, .	-	-	1	78	304 days, .	-	-	3	106
290 days, .	1	131	-	-	305 days, .	1	61	1	453
291 days, .	-	-	1	131	306 days, .	6	158	5	149
298 days, .	1	77	-	-	307 days, .	2	357	-	-
300 days, .	2	62	1	40	TOTALS, .	17	1,070	17	1,197

## CARPETINGS.

161 days, .	1	13	-	-	282 days, .	1	8	-	-
270 days, .	1	36	-	-	287 days, .	1	1,080	-	-
275 days, .	1	20	-	-	290 days, .	1	65	-	-
279 days, .	-	-	1	9	291 days, .	-	-	1	65

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## CARPETINGS — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
292 days, .	-	-	1	37	304 days, .	1	756	-	-
294 days, .	-	-	1	1,074	306 days, .	2	297	8	2,377
296 days, .	1	8	-	-	307 days, .	-	-	1	23
299 days, .	-	-	1	756	310 days, .	-	-	1	14
300 days, .	1	2,046	-	-	TOTALS, .	12	4,635	12	4,672
301 days, .	-	-	1	308					
302 days, .	1	306	1	9					

## CARRIAGES AND WAGONS.

100 days, .	-	-	2	9	288 days, .	2	39	1	109
130 days, .	-	-	1	4	289 days, .	-	-	1	81
140 days, .	1	25	-	-	290 days, .	5	108	1	48
153 days, .	1	2	1	1	294 days, .	1	4	-	-
178 days, .	-	-	1	3	295 days, .	-	-	2	306
212 days, .	-	-	1	16	296 days, .	1	97	2	68
230 days, .	-	-	1	5	298 days, .	1	43	-	-
247 days, .	-	-	1	4	300 days, .	15	342	15	356
250 days, .	1	9	1	12	302 days, .	2	275	-	-
257 days, .	-	-	1	37	304 days, .	1	22	-	-
260 days, .	1	52	-	-	305 days, .	1	14	5	93
265 days, .	-	-	1	33	306 days, .	44	822	35	720
270 days, .	1	18	1	21	307 days, .	4	133	1	42
273 days, .	1	19	-	-	308 days, .	4	93	5	30
275 days, .	2	3	4	21	309 days, .	1	24	1	18
280 days, .	2	13	4	81	311 days, .	-	-	1	4
283 days, .	1	24	-	-	TOTALS, .	96	2,244	96	2,299
285 days, .	1	42	4	119					
286 days, .	2	26	2	58					

## CEMENT, KAOLIN, LIME, AND PLASTER.

276 days, .	-	-	1	6	305 days, .	1	56	-	-
292 days, .	1	3	1	3	306 days, .	2	9	-	-
300 days, .	-	-	1	2	TOTALS, .	4	68	4	58
304 days, .	-	-	1	47					

## CHEMICAL PREPARATIONS (COMPOUNDED).

150 days, .	1	1	-	-	280 days, .	1	18	-	-
153 days, .	1	2	-	-	300 days, .	1	8	1	4
154 days, .	-	-	1	1	305 days, .	-	-	1	8
234 days, .	-	-	1	2	306 days, .	3	231	3	186
247 days, .	-	-	1	62	313 days, .	1	6	-	-
250 days, .	-	-	1	16	TOTALS, .	9	267	9	279
279 days, .	1	1	-	-					

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## CLOCKS, WATCHES, AND JEWELRY.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
220 days, .	-	-	1	5	278 days, .	1	44	-	-
230 days, .	1	34	1	27	279 days, .	1	90	1	133
232 days, .	-	-	1	31	280 days, .	8	279	5	174
236 days, .	-	-	1	11	281 days, .	-	-	1	38
238 days, .	-	-	1	16	282 days, .	1	26	1	42
240 days, .	-	-	3	66	283 days, .	1	124	2	100
245 days, .	1	58	-	-	284 days, .	1	90	-	-
247 days, .	-	-	1	39	285 days, .	-	-	1	39
249 days, .	-	-	1	22	286 days, .	3	81	1	68
250 days, .	2	13	3	114	288 days, .	1	38	2	16
251 days, .	-	-	1	34	289 days, .	1	78	1	59
253 days, .	-	-	1	20	290 days, .	8	514	2	14
256 days, .	1	62	1	96	291 days, .	1	63	-	-
258 days, .	1	46	-	-	293 days, .	1	24	-	-
259 days, .	-	-	1	15	294 days, .	1	57	1	63
260 days, .	-	-	1	11	295 days, .	2	140	-	-
261 days, .	1	23	1	46	296 days, .	2	116	1	112
262 days, .	1	17	-	-	298 days, .	-	-	1	127
265 days, .	2	108	-	-	300 days, .	13	615	8	364
266 days, .	-	-	1	74	302 days, .	-	-	1	6
270 days, .	4	103	4	181	304 days, .	1	20	-	-
273 days, .	-	-	2	246	305 days, .	-	-	2	109
274 days, .	-	-	1	83	306 days, .	14	454	13	455
275 days, .	-	-	3	186	307 days, .	-	-	1	72
276 days, .	1	42	-	-	309 days, .	-	-	1	47
277 days, .	1	63	1	13	TOTALS, .	77	3,422	77	3,394

## CLOTHING.

100 days, .	1	4	-	-	258 days, .	1	154	1	58
104 days, .	1	5	1	5	260 days, .	3	229	2	178
153 days, .	1	7	1	7	265 days, .	-	-	2	194
156 days, .	1	3	1	2	270 days, .	1	20	-	-
176 days, .	-	-	1	132	271 days, .	1	28	-	-
190 days, .	-	-	1	17	274 days, .	1	150	-	-
194 days, .	1	25	-	-	275 days, .	1	81	1	58
200 days, .	2	29	1	11	276 days, .	-	-	1	42
215 days, .	1	30	-	-	279 days, .	-	-	1	7
220 days, .	-	-	1	22	280 days, .	1	65	4	132
227 days, .	-	-	1	22	284 days, .	-	-	1	62
228 days, .	1	6	-	-	286 days, .	2	74	-	-
246 days, .	1	7	-	-	287 days, .	-	-	1	106
250 days, .	1	98	2	101	288 days, .	1	38	5	465
254 days, .	-	-	1	88	290 days, .	5	455	1	55
256 days, .	-	-	1	24	292 days, .	2	186	-	-

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## CLOTHING — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
294 days, .	1	255	1	120	305 days, .	5	285	1	2
295 days, .	-	-	2	134	306 days, .	56	3,404	50	3,195
296 days, .	1	350	1	60	307 days, .	1	228	-	-
298 days, .	-	-	2	70	310 days, .	1	26	-	-
300 days, .	14	1,182	19	1,782	312 days, .	1	16	-	-
303 days, .	1	40	2	152					
304 days, .	2	698	3	794	TOTALS, .	113	8,178	113	8,097

## COOKING, LIGHTING, AND HEATING APPARATUS.

140 days, .	-	-	1	18	270 days, .	-	-	1	39
166 days, .	1	22	-	-	272 days, .	1	255	1	255
186 days, .	-	-	1	24	273 days, .	1	30	-	-
202 days, .	-	-	1	26	275 days, .	-	-	1	99
213 days, .	1	22	-	-	276 days, .	1	43	-	-
232 days, .	1	55	-	-	279 days, .	1	156	-	-
235 days, .	-	-	1	16	280 days, .	-	-	2	310
237 days, .	-	-	1	46	281 days, .	-	-	1	29
241 days, .	1	38	-	-	282 days, .	2	214	-	-
242 days, .	1	37	-	-	284 days, .	1	216	-	-
245 days, .	1	97	-	-	285 days, .	-	-	2	170
247 days, .	-	-	1	95	288 days, .	1	38	-	-
249 days, .	-	-	1	38	290 days, .	-	-	1	233
250 days, .	1	45	1	31	300 days, .	3	84	3	304
254 days, .	1	35	-	-	305 days, .	1	5	1	6
255 days, .	1	17	-	-	306 days, .	7	332	6	326
257 days, .	-	-	1	34	308 days, .	-	-	1	17
260 days, .	1	171	1	46	309 days, .	1	12	-	-
263 days, .	-	-	1	65					
265 days, .	1	170	-	-	TOTALS, .	31	2,094	31	2,227

## CORDAGE AND TWINE.

150 days, .	1	6	-	-	292 days, .	2	593	-	-
153 days, .	1	74	-	-	296 days, .	1	356	-	-
235 days, .	1	114	-	-	297 days, .	-	-	1	400
243 days, .	-	-	1	125	298 days, .	1	180	-	-
256 days, .	-	-	1	5	300 days, .	5	250	5	184
260 days, .	-	-	1	9	302 days, .	-	-	1	58
264 days, .	-	-	1	136	303 days, .	1	61	-	-
280 days, .	1	9	1	126	304 days, .	-	-	2	651
284 days, .	1	507	-	-	306 days, .	7	415	6	865
285 days, .	1	320	1	507	309 days, .	1	70	1	73
286 days, .	-	-	1	332	312 days, .	-	-	1	15
287 days, .	1	325	1	109	TOTALS, .	25	3,280	25	3,595



## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## CORKS, BUNGS, AND TAPS.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
275 days, .	-	-	1	10	306 days, .	2	19	1	10
300 days, .	1	16	1	9					
305 days, .	1	10	1	13	TOTALS, .	4	45	4	42

## COTTON GOODS.

45 days, .	-	-	1	7	287 days, .	1	223	-	-
70 days, .	1	91	-	-	288 days, .	2	405	-	-
126 days, .	1	43	-	-	289 days, .	2	584	-	-
144 days, .	1	138	-	-	290 days, .	5	2,851	5	817
146 days, .	-	-	1	38	291 days, .	2	403	2	361
175 days, .	-	-	1	71	292 days, .	4	1,858	2	1,316
220 days, .	1	796	-	-	293 days, .	1	370	1	21
221 days, .	1	7	-	-	294 days, .	2	750	1	308
225 days, .	1	178	-	-	295 days, .	6	2,099	1	233
232 days, .	-	-	1	54	296 days, .	3	1,257	1	75
243 days, .	-	-	1	9	297 days, .	6	3,107	-	-
245 days, .	-	-	1	109	298 days, .	7	4,369	1	332
247 days, .	1	42	1	37	299 days, .	-	-	5	1,408
248 days, .	-	-	1	344	300 days, .	12	5,961	13	2,804
250 days, .	1	23	-	-	301 days, .	5	2,511	4	1,358
255 days, .	-	-	1	73	302 days, .	4	2,027	3	392
263 days, .	1	12	2	48	303 days, .	7	2,724	6	3,876
264 days, .	1	324	1	14	304 days, .	9	4,676	13	5,405
267 days, .	1	44	1	39	305 days, .	16	4,580	14	7,429
268 days, .	1	85	-	-	306 days, .	27	14,980	40	22,574
270 days, .	2	112	1	21	307 days, .	4	5,864	8	8,657
273 days, .	-	-	2	100	308 days, .	5	4,870	5	3,408
275 days, .	2	138	-	-	309 days, .	1	38	3	2,244
276 days, .	1	161	1	57	310 days, .	-	-	1	43
277 days, .	2	113	-	-	311 days, .	-	-	3	857
278 days, .	-	-	1	160	312 days, .	-	-	2	3,620
280 days, .	3	541	1	41	313 days, .	-	-	2	2,476
282 days, .	4	1,301	-	-					
283 days, .	-	-	1	681	TOTALS, .	157	70,596	157	71,960
285 days, .	-	-	1	13					

## COTTON, WOOLLEN, AND OTHER TEXTILES.

240 days, .	1	132	-	-	307 days, .	-	-	1	34
303 days, .	1	26	-	-	313 days, .	-	-	1	2,097
306 days, .	1	1,976	1	168	TOTALS, .	3	2,134	3	2,299

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## CRAYONS, PENCILS, CRUCIBLES, ETC.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
293 days, .	-	-	1	17	306 days, .	2	29	-	-
300 days, .	1	19	1	14	306 days, .	1	1	-	-
304 days, .	-	-	2	12	TOTALS, .	4	49	4	43

## DRUGS AND MEDICINES.

250 days, .	1	2	1	2	304 days, .	-	-	1	26
268 days, .	-	-	1	35	305 days, .	-	-	1	9
275 days, .	-	-	1	1	306 days, .	13	280	11	292
276 days, .	1	34	-	-	308 days, .	1	69	-	-
280 days, .	1	1	1	16	313 days, .	-	-	1	44
290 days, .	1	16	-	-	TOTALS, .	19	377	19	432
300 days, .	1	5	1	7					

## DYESTUFFS.

250 days, .	-	-	1	102	305 days, .	-	-	1	24
280 days, .	1	104	-	-	306 days, .	3	54	2	45
275 days, .	-	-	1	14	307 days, .	1	5	1	9
300 days, .	1	30	-	-	308 days, .	1	24	-	-
304 days, .	-	-	1	24	TOTALS, .	7	217	7	218

## EARTHEN, PLASTER, AND STONE WARE.

217 days, .	-	-	1	87	300 days, .	2	36	-	-
270 days, .	-	-	1	14	305 days, .	-	-	1	22
280 days, .	-	-	1	93	306 days, .	1	86	-	-
285 days, .	1	100	-	-	TOTALS, .	4	222	4	216

## ELECTRICAL APPARATUS AND APPLIANCES.

302 days, .	1	2,440	-	-	306 days, .	4	155	3	2,553
305 days, .	-	-	2	107	TOTALS, .	5	2,595	5	2,660

## ELECTROPLATING.

246 days, .	1	17	-	-	290 days, .	1	3	-	-
269 days, .	1	21	-	-	306 days, .	6	31	6	29
278 days, .	-	-	1	25	310 days, .	-	-	1	14
280 days, .	1	5	1	5	TOTALS, .	10	77	10	79
286 days, .	-	-	1	6					

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

EMERY AND SAND PAPER AND CLOTH, ETC.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
182 days, .	1	17	-	-	303 days, .	1	15	1	60
225 days, .	1	3	-	-	306 days, .	5	158	5	88
275 days, .	1	36	1	6	308 days, .	1	25	1	26
280 days, .	-	-	1	36	313 days, .	-	-	1	83
300 days, .	3	26	3	37	TOTALS, .	13	230	13	336

## FANCY ARTICLES.

239 days, .	1	24	-	-	305 days, .	1	20	-	-
287 days, .	-	-	1	20	306 days, .	1	1	-	-
300 days, .	3	199	2	171	307 days, .	-	-	1	1
303 days, .	-	-	1	3	TOTALS, .	6	244	6	219
304 days, .	-	-	1	24					

## FERTILIZERS.

150 days, .	1	13	1	13	306 days, .	2	16	1	6
290 days, .	-	-	1	13	309 days, .	1	8	1	10
300 days, .	3	25	3	11	TOTALS, .	7	62	7	53

## FINE ARTS AND TAXIDERMV.

306 days, .	2	7	2	7	TOTALS, .	2	7	2	7
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## FIREWORKS AND MATCHES.

244 days, .	1	22	-	-	306 days, .	1	8	1	23
265 days, .	-	-	1	20	TOTALS, .	3	62	3	71
300 days, .	1	22	1	23					

## FLAX, HEMP, JUTE, AND LINEN GOODS.

275 days, .	-	-	1	23	301 days, .	-	-	1	258
277 days, .	1	26	-	-	302 days, .	-	-	1	259
278 days, .	1	35	-	-	305 days, .	1	839	1	832
296 days, .	-	-	1	472	306 days, .	2	289	1	34
298 days, .	1	255	-	-	TOTALS, .	8	1,875	8	1,897
300 days, .	2	451	2	14					

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.

DAYS IN OPERATION—1890, 1891—Continued.

## FOOD PREPARATIONS.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
40 days, .	1	19	-	-	280 days, .	3	111	1	22
51 days, .	-	-	1	15	284 days, .	1	209	-	-
75 days, .	1	2	1	2	285 days, .	-	-	1	6
76 days, .	1	1	-	-	286 days, .	-	-	1	378
90 days, .	-	-	1	1	287 days, .	2	387	2	42
100 days, .	1	1	-	-	290 days, .	2	20	4	91
102 days, .	1	4	2	2	291 days, .	-	-	1	276
103 days, .	-	-	1	6	292 days, .	1	5	-	-
110 days, .	-	-	1	4	294 days, .	2	29	-	-
150 days, .	3	3	6	49	295 days, .	-	-	1	5
153 days, .	-	-	1	9	300 days, .	38	1,205	32	849
154 days, .	1	1	1	2	301 days, .	1	13	1	535
160 days, .	1	10	-	-	302 days, .	1	13	-	-
168 days, .	-	-	1	5	303 days, .	-	-	2	39
175 days, .	1	11	-	-	304 days, .	2	17	1	12
179 days, .	1	1	-	-	305 days, .	5	105	6	148
180 days, .	1	21	-	-	306 days, .	138	3,279	125	3,069
195 days, .	-	-	1	4	307 days, .	1	41	3	54
200 days, .	3	99	4	4	308 days, .	2	9	4	58
201 days, .	-	-	1	1	309 days, .	1	3	2	861
204 days, .	1	2	1	3	310 days, .	6	83	6	70
205 days, .	1	1	-	-	311 days, .	-	-	1	9
206 days, .	-	-	1	1	312 days, .	3	15	1	1
208 days, .	2	295	1	2	313 days, .	10	80	11	100
210 days, .	1	1	1	1	315 days, .	-	-	1	25
220 days, .	2	7	-	-	316 days, .	-	-	1	10
225 days, .	1	37	1	3	322 days, .	1	12	-	-
228 days, .	-	-	2	38	336 days, .	1	3	1	3
231 days, .	-	-	1	2	337 days, .	-	-	4	24
240 days, .	1	8	-	-	350 days, .	1	8	-	-
250 days, .	2	4	4	6	360 days, .	1	16	1	11
268 days, .	-	-	1	80	365 days, .	12	201	11	170
275 days, .	1	25	3	7					
276 days, .	1	17	-	-	TOTALS, .	264	6,434	264	7,082
277 days, .	-	-	1	17					

## FURNITURE.

60 days, .	1	2	-	-	193 days, .	1	2	-	-
126 days, .	-	-	1	6	200 days, .	1	8	1	1
150 days, .	-	-	2	9	214 days, .	-	-	1	14
156 days, .	-	-	1	18	228 days, .	1	5	1	5
160 days, .	1	15	-	-	230 days, .	1	3	-	-
180 days, .	1	5	-	-	240 days, .	1	26	1	5

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## FURNITURE — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
250 days, .	1	5	1	27	292 days, .	2	86	1	26
256 days, .	1	2	-	-	293 days, .	1	72	-	-
258 days, .	1	2	-	-	294 days, .	2	59	3	133
267 days, .	1	10	-	-	295 days, .	-	-	3	68
268 days, .	-	-	1	11	296 days, .	1	48	1	9
270 days, .	2	48	-	-	297 days, .	-	-	1	74
272 days, .	1	8	1	14	298 days, .	1	33	2	122
275 days, .	2	56	1	10	299 days, .	-	-	1	9
276 days, .	-	-	1	29	300 days, .	30	2,045	16	1,809
277 days, .	-	-	1	23	301 days, .	-	-	1	22
278 days, .	-	-	1	44	302 days, .	1	45	1	91
280 days, .	1	26	3	37	304 days, .	2	99	3	72
281 days, .	1	14	-	-	305 days, .	4	143	1	39
282 days, .	1	34	-	-	306 days, .	40	1,407	52	1,725
283 days, .	-	-	1	20	307 days, .	1	21	-	-
285 days, .	1	8	3	78	309 days, .	1	36	1	11
288 days, .	2	130	3	176	313 days, .	2	21	-	-
290 days, .	7	313	8	257					
291 days, .	2	34	-	-	TOTALS, .	120	4,871	120	4,994

## GLASS.

155 days, .	-	-	1	17	300 days, .	-	-	1	8
260 days, .	1	245	-	-	305 days, .	2	43	1	9
270 days, .	1	30	-	-	306 days, .	6	140	5	151
280 days, .	-	-	2	303	TOTALS, .	10	458	10	488

## GLUE, ISINGLASS, AND STARCH.

90 days, .	-	-	1	25	240 days, .	1	17	-	-
95 days, .	1	25	-	-	260 days, .	-	-	1	34
175 days, .	1	4	-	-	270 days, .	-	-	1	22
200 days, .	1	3	2	128	275 days, .	1	34	-	-
204 days, .	1	4	1	4	300 days, .	2	33	2	38
208 days, .	1	4	1	6	302 days, .	-	-	1	19
230 days, .	-	-	1	3	306 days, .	3	191	2	75
234 days, .	1	40	-	-	313 days, .	1	31	-	-
236 days, .	-	-	1	45	TOTALS, .	14	386	14	399

## HAIR WORK (ANIMAL AND HUMAN).

153 days, .	-	-	1	2	300 days, .	1	4	1	4
207 days, .	1	3	1	4	304 days, .	-	-	1	133
247 days, .	1	31	-	-	306 days, .	6	158	5	43
250 days, .	1	17	1	14	TOTALS, .	10	213	10	205

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

## DAYS IN OPERATION — 1890, 1891 — Continued.

## HOSE: RUBBER, LINEN, ETC.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
78 days, .	-	-	1	1	301 days, .	1	17	-	-
91 days, .	1	1	-	-	306 days, .	2	13	3	49
297 days, .	1	144	-	-	TOTALS, .	5	175	5	238
298 days, .	-	-	1	183					

## HOSIERY AND KNIT GOODS.

76 days, .	-	-	1	1	272 days, .	1	137	-	-
100 days, .	1	2	1	1	275 days, .	1	33	-	-
104 days, .	1	2	1	3	280 days, .	1	32	2	318
106 days, .	-	-	1	5	286 days, .	1	49	-	-
150 days, .	2	17	1	2	288 days, .	1	230	1	92
200 days, .	3	18	1	3	290 days, .	-	-	2	39
210 days, .	1	10	-	-	292 days, .	2	206	1	74
218 days, .	1	8	-	-	294 days, .	3	277	2	103
220 days, .	-	-	1	18	295 days, .	1	35	2	88
224 days, .	1	5	1	8	298 days, .	1	665	-	-
230 days, .	1	11	-	-	300 days, .	3	101	5	844
240 days, .	1	5	2	13	303 days, .	2	85	-	-
250 days, .	1	5	1	2	304 days, .	1	39	1	38
252 days, .	-	-	1	23	305 days, .	1	334	1	36
258 days, .	1	5	-	-	306 days, .	6	1,752	7	823
264 days, .	-	-	1	127	307 days, .	-	-	2	2,445
265 days, .	1	14	1	24	TOTALS, .	40	4,077	40	5,130

## INK, MUCILAGE, AND PASTE.

226 days, .	1	2	-	-	280 days, .	-	-	1	5
239 days, .	-	-	1	3	290 days, .	1	5	-	-
240 days, .	-	-	1	3	306 days, .	5	105	5	104
250 days, .	1	3	-	-	TOTALS, .	8	115	8	115

## IVORY, BONE, SHELL, AND HORN GOODS, ETC.

276 days, .	1	36	-	-	300 days, .	2	96	3	102
280 days, .	1	18	-	-	301 days, .	-	-	1	17
285 days, .	-	-	1	81	305 days, .	1	6	1	34
290 days, .	-	-	1	44	306 days, .	5	182	3	118
293 days, .	-	-	1	38	307 days, .	-	-	1	46
295 days, .	1	23	-	-	312 days, .	-	-	1	24
296 days, .	1	23	-	-	TOTALS, .	13	461	13	504
299 days, .	1	77	-	-					

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## LEATHER.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
151 days, .	-	-	1	10	275 days, .	3	49	2	43
152 days, .	-	-	1	2	276 days, .	1	9	-	-
153 days, .	-	-	1	24	278 days, .	1	133	2	87
154 days, .	-	-	1	6	279 days, .	-	-	2	226
159 days, .	-	-	1	11	280 days, .	3	288	3	29
160 days, .	-	-	1	2	282 days, .	1	67	1	111
180 days, .	1	4	1	7	283 days, .	-	-	2	58
182 days, .	-	-	1	47	284 days, .	1	22	2	112
192 days, .	1	11	-	-	285 days, .	1	30	2	60
193 days, .	1	9	-	-	286 days, .	1	11	1	28
200 days, .	-	-	3	27	287 days, .	1	94	-	-
204 days, .	2	35	1	1	288 days, .	-	-	2	24
206 days, .	-	-	1	10	290 days, .	4	289	2	79
220 days, .	-	-	2	28	293 days, .	1	116	-	-
228 days, .	-	-	1	68	294 days, .	3	117	-	-
229 days, .	1	91	-	-	295 days, .	-	-	1	26
230 days, .	-	-	1	8	296 days, .	2	172	2	148
231 days, .	-	-	1	29	298 days, .	1	78	-	-
234 days, .	1	10	-	-	299 days, .	1	25	1	22
240 days, .	2	33	-	-	300 days, .	33	1,166	26	1,109
245 days, .	-	-	1	34	301 days, .	2	114	4	169
246 days, .	1	48	-	-	302 days, .	1	33	-	-
250 days, .	2	50	1	166	303 days, .	1	28	-	-
253 days, .	-	-	1	87	305 days, .	5	289	7	145
257 days, .	-	-	1	46	306 days, .	57	2,004	53	1,651
258 days, .	1	49	-	-	307 days, .	2	63	4	191
260 days, .	2	45	3	50	309 days, .	1	12	2	50
265 days, .	1	31	-	-	310 days, .	-	-	1	51
266 days, .	2	86	-	-	311 days, .	1	10	-	-
268 days, .	1	11	-	-	313 days, .	3	186	3	108
270 days, .	3	59	3	123					
274 days, .	1	160	1	200	TOTALS, .	154	6,137	154	5,512

## LIQUORS AND BEVERAGES (NOT SPIRITUOUS).

152 days, .	1	6	-	-	305 days, .	1	7	1	6
200 days, .	1	2	-	-	306 days, .	6	85	7	75
231 days, .	-	-	1	3	308 days, .	-	-	1	34
300 days, .	1	6	-	-	317 days, .	1	3	1	3
304 days, .	1	6	1	5	TOTALS, .	12	115	12	126

## LIQUORS: MALT, DISTILLED, AND FERMENTED.

10 days, .	1	1	-	-	25 days, .	-	-	1	1
18 days, .	1	1	-	-	30 days, .	1	1	1	1
23 days, .	1	1	-	-	38 days, .	-	-	1	11

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

LIQUORS: MALT, DISTILLED, AND FERMENTED — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
45 days, .	1	1	-	-	245 days, .	1	5	-	-
50 days, .	1	1	1	1	248 days, .	1	11	-	-
52 days, .	1	1	1	1	273 days, .	-	-	1	5
64 days, .	1	1	-	-	290 days, .	-	-	1	7
77 days, .	1	1	-	-	295 days, .	1	2	-	-
78 days, .	-	-	1	1	296 days, .	-	-	1	2
80 days, .	-	-	1	1	300 days, .	1	19	2	27
90 days, .	1	1	2	2	303 days, .	1	27	1	25
100 days, .	-	-	2	3	304 days, .	-	-	2	97
101 days, .	1	1	-	-	305 days, .	2	82	1	22
108 days, .	-	-	1	1	306 days, .	19	567	19	577
150 days, .	1	1	-	-	309 days, .	-	-	1	60
153 days, .	1	4	-	-	310 days, .	1	20	1	20
180 days, .	1	2	-	-	312 days, .	1	17	2	72
200 days, .	1	2	1	2	313 days, .	3	100	1	4
225 days, .	-	-	1	2	365 days, .	-	-	2	64
240 days, .	2	50	-	-					
244 days, .	1	8	-	-	TOTALS, .	49	928	49	1,009

## LUMBER.

150 days, .	-	-	1	1	299 days, .	1	70	-	-
200 days, .	2	2	1	1	300 days, .	5	59	4	29
220 days, .	1	10	-	-	301 days, .	2	62	1	49
230 days, .	-	-	1	227	304 days, .	1	34	-	-
250 days, .	-	-	2	12	305 days, .	1	37	2	71
259 days, .	-	-	1	16	306 days, .	6	78	7	133
272 days, .	1	271	-	-	307 days, .	-	-	1	96
286 days, .	-	-	1	51	310 days, .	1	8	2	41
290 days, .	2	26	-	-	313 days, .	1	67	-	-
294 days, .	1	27	1	26	TOTALS, .	25	751	25	753

## MACHINES AND MACHINERY.

150 days, .	1	1	2	2	273 days, .	1	3	-	-
200 days, .	1	2	2	10	278 days, .	-	-	1	97
225 days, .	-	-	1	18	280 days, .	2	65	3	63
227 days, .	-	-	1	6	283 days, .	-	-	1	21
229 days, .	1	6	-	-	284 days, .	-	-	2	30
234 days, .	-	-	1	1	286 days, .	-	-	1	9
236 days, .	1	7	-	-	287 days, .	-	-	1	60
239 days, .	1	-	1	1	289 days, .	1	11	1	11
245 days, .	-	-	1	5	290 days, .	2	97	2	158
250 days, .	1	2	1	2	292 days, .	2	25	-	-
280 days, .	2	107	1	98	293 days, .	2	294	1	29



## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## MACHINES AND MACHINERY — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
294 days, .	-	-	2	350	304 days, .	10	161	8	1,239
295 days, .	6	565	6	723	305 days, .	15	568	13	1,059
296 days, .	1	4	3	177	306 days, .	129	7,043	114	7,782
297 days, .	1	6	-	-	307 days, .	4	1,077	12	1,144
298 days, .	2	145	1	146	308 days, .	7	624	8	77
299 days, .	2	223	2	245	309 days, .	4	1,371	-	-
300 days, .	37	1,258	48	1,405	310 days, .	6	878	2	58
301 days, .	1	88	2	55	312 days, .	-	-	1	45
302 days, .	8	1,132	6	398	313 days, .	6	180	2	409
303 days, .	6	316	4	187	TOTALS, .	263	15,709	263	16,120

## METALS AND METALLIC GOODS.

70 days, .	-	-	1	34	265 days, .	2	104	-	-
74 days, .	1	3	-	-	266 days, .	1	26	-	-
93 days, .	1	40	-	-	270 days, .	1	21	2	37
100 days, .	1	2	1	1	272 days, .	1	20	-	-
102 days, .	-	-	1	10	273 days, .	-	-	1	8
125 days, .	2	19	-	-	274 days, .	-	-	1	11
130 days, .	-	-	1	1	275 days, .	2	700	4	251
153 days, .	1	1	-	-	276 days, .	1	14	-	-
175 days, .	-	-	1	4	277 days, .	1	44	-	-
200 days, .	1	21	2	39	278 days, .	1	26	-	-
213 days, .	1	1	-	-	279 days, .	1	5	-	-
215 days, .	-	-	1	23	280 days, .	6	437	9	248
225 days, .	2	140	1	9	281 days, .	1	24	1	48
228 days, .	-	-	1	326	282 days, .	2	174	-	-
229 days, .	1	341	-	-	283 days, .	1	25	1	41
230 days, .	-	-	1	72	284 days, .	2	49	-	-
234 days, .	2	11	1	1	285 days, .	1	72	4	149
236 days, .	1	2	-	-	286 days, .	3	264	2	188
240 days, .	2	26	1	16	287 days, .	-	-	1	46
244 days, .	-	-	1	24	288 days, .	4	94	1	62
245 days, .	1	9	-	-	289 days, .	2	98	2	128
246 days, .	1	38	-	-	290 days, .	4	85	8	541
247 days, .	-	-	2	43	291 days, .	1	68	2	25
250 days, .	2	46	4	66	292 days, .	2	172	2	24
251 days, .	-	-	1	174	293 days, .	1	12	1	20
253 days, .	-	-	2	36	294 days, .	1	71	2	670
254 days, .	1	4	-	-	295 days, .	4	129	4	247
256 days, .	-	-	1	23	296 days, .	1	16	2	110
260 days, .	3	95	1	55	297 days, .	3	821	4	112
262 days, .	-	-	1	5	298 days, .	3	375	3	480
263 days, .	-	-	1	13	299 days, .	1	198	2	82

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.

DAYS IN OPERATION—1890, 1891—Continued.

## METALS AND METALLIC GOODS—Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
300 days, .	38	1,018	45	1,645	307 days, .	6	257	7	495
301 days, .	4	164	1	232	308 days, .	3	31	3	26
302 days, .	9	557	7	200	309 days, .	3	82	3	121
303 days, .	-	-	7	982	310 days, .	8	117	2	232
304 days, .	13	1,196	10	335	311 days, .	1	184	1	7
305 days, .	14	564	9	430	313 days, .	2	8	1	44
306 days, .	103	7,975	95	8,121	TOTALS, .	277	17,096	277	17,373

## MIXED TEXTILES.

222 days, .	-	-	1	80	300 days, .	1	39	1	49
239 days, .	-	-	1	61	301 days, .	-	-	1	28
248 days, .	1	131	-	-	302 days, .	-	-	2	48
268 days, .	-	-	1	25	305 days, .	1	16	-	-
270 days, .	1	27	-	-	306 days, .	6	522	4	460
275 days, .	1	27	-	-	312 days, .	-	-	1	16
290 days, .	1	58	1	30	TOTALS, .	13	833	13	797
297 days, .	1	13	-	-					

## MODELS AND PATTERNS.

305 days, .	1	3	-	-	TOTALS, .	5	41	5	42
306 days, .	4	38	5	42					

## MUSICAL INSTRUMENTS AND MATERIALS.

174 days, .	-	-	1	4	295 days, .	1	20	-	-
205 days, .	-	-	1	4	296 days, .	1	26	-	-
206 days, .	1	21	-	-	297 days, .	-	-	1	220
208 days, .	-	-	1	1	298 days, .	1	40	-	-
214 days, .	-	-	1	14	299 days, .	1	347	2	491
244 days, .	1	9	-	-	300 days, .	6	317	9	528
262 days, .	1	360	-	-	301 days, .	1	6	-	-
264 days, .	-	-	1	24	302 days, .	1	26	-	-
275 days, .	1	1	1	2	303 days, .	-	-	1	125
280 days, .	-	-	2	283	304 days, .	-	-	1	54
285 days, .	-	-	2	19	305 days, .	2	44	2	147
288 days, .	1	208	1	20	306 days, .	26	1,459	15	636
290 days, .	-	-	1	40	309 days, .	-	-	1	31
292 days, .	1	5	-	-	313 days, .	-	-	1	30
294 days, .	-	-	1	19	TOTALS, .	46	2,889	46	2,992

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

## DAYS IN OPERATION — 1890, 1891 — Continued.

## OILS AND ILLUMINATING FLUIDS.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
279 days, .	1	2	-	-	312 days, .	-	-	1	42
300 days, .	1	35	2	44	318 days, .	1	41	-	-
306 days, .	5	82	5	79	TOTALS, .	9	173	9	181
308 days, .	1	13	1	16					

## PAINTS, COLORS, AND CRUDE CHEMICALS.

190 days, .	1	3	1	4	300 days, .	4	107	5	104
244 days, .	-	-	1	2	302 days, .	-	-	1	29
249 days, .	1	3	-	-	305 days, .	1	18	-	-
250 days, .	1	8	-	-	306 days, .	6	75	5	60
260 days, .	-	-	1	8	307 days, .	-	-	1	23
275 days, .	2	28	-	-	TOTALS, .	16	242	16	240
284 days, .	-	-	1	10					

## PAPER AND PAPER GOODS.

30 days, .	-	-	1	1	285 days, .	-	-	3	339
40 days, .	1	1	-	-	288 days, .	3	368	-	-
150 days, .	2	21	-	-	290 days, .	2	441	1	211
154 days, .	-	-	1	8	292 days, .	1	208	2	67
162 days, .	1	25	-	-	293 days, .	2	158	2	486
200 days, .	1	2	-	-	294 days, .	1	163	-	-
205 days, .	-	-	1	11	295 days, .	3	248	3	75
218 days, .	1	172	-	-	296 days, .	1	239	-	-
220 days, .	-	-	1	73	298 days, .	3	380	-	-
225 days, .	-	-	1	32	299 days, .	1	149	-	-
226 days, .	1	19	-	-	300 days, .	18	1,868	11	1,042
230 days, .	-	-	2	47	301 days, .	2	71	-	-
232 days, .	-	-	1	21	302 days, .	2	231	2	136
236 days, .	1	103	-	-	303 days, .	2	276	2	332
238 days, .	-	-	1	18	304 days, .	2	80	3	371
239 days, .	-	-	1	2	305 days, .	2	245	6	720
240 days, .	1	73	-	-	306 days, .	22	2,217	32	3,756
253 days, .	-	-	2	34	307 days, .	3	238	3	354
256 days, .	1	33	-	-	308 days, .	4	366	6	534
260 days, .	1	16	-	-	309 days, .	1	58	1	191
265 days, .	1	24	-	-	310 days, .	5	395	3	149
266 days, .	-	-	1	119	311 days, .	1	68	1	61
270 days, .	1	29	-	-	312 days, .	1	127	1	175
275 days, .	2	48	1	115	313 days, .	2	251	-	-
276 days, .	1	119	2	284	TOTALS, .	102	9,574	102	9,873
290 days, .	1	16	3	50					
282 days, .	1	118	1	59					

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## PERFUMES, TOILET ARTICLES, ETC.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
300 days, .	2	9	1	5	TOTALS, .	4	35	4	36
306 days, .	2	26	3	31					

## PHOTOGRAPHS AND PHOTOGRAPHIC MATERIALS.

280 days, .	-	-	1	14	311 days, .	1	31	1	37
300 days, .	1	22	-	-	TOTALS, .	11	152	11	141
306 days, .	9	99	9	90					

## POLISHES AND DRESSING.

205 days, .	1	5	-	-	301 days, .	1	1	-	-
270 days, .	1	3	1	3	306 days, .	12	195	12	115
285 days, .	1	9	-	-	307 days, .	-	-	1	9
292 days, .	1	10	-	-	313 days, .	-	-	1	1
296 days, .	-	-	1	75	TOTALS, .	18	229	18	218
300 days, .	1	6	2	15					

## PRINTING, PUBLISHING, AND BOOKBINDING.

204 days, .	1	73	-	-	305 days, .	1	7	2	448
278 days, .	-	-	1	77	306 days, .	16	1,477	15	1,027
280 days, .	-	-	1	11	307 days, .	1	12	-	-
295 days, .	-	-	1	57	308 days, .	-	-	1	28
300 days, .	-	-	2	95	313 days, .	1	25	-	-
301 days, .	3	155	-	-	TOTALS, .	24	1,755	24	1,796
302 days, .	1	6	1	53					

## PRINT WORKS, DYE WORKS, AND BLEACHERIES.

76 days, .	-	-	1	156	295 days, .	2	125	-	-
185 days, .	1	10	-	-	296 days, .	1	160	-	-
203 days, .	-	-	1	9	299 days, .	-	-	1	816
229 days, .	1	111	-	-	300 days, .	4	295	12	1,306
250 days, .	-	-	1	7	301 days, .	-	-	1	436
254 days, .	1	2	-	-	302 days, .	-	-	2	583
267 days, .	1	13	-	-	303 days, .	-	-	1	268
270 days, .	-	-	1	2	304 days, .	3	878	1	165
273 days, .	1	423	-	-	305 days, .	2	1,327	1	5
275 days, .	-	-	2	117	306 days, .	14	1,222	7	36
278 days, .	1	471	-	-	307 days, .	-	-	1	248
279 days, .	1	141	-	-	308 days, .	1	264	-	-
280 days, .	-	-	1	162	310 days, .	2	15	1	8
282 days, .	1	64	-	-	313 days, .	-	-	1	901
285 days, .	-	-	1	15	TOTALS, .	37	5,521	37	5,240

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

## DAYS IN OPERATION — 1890, 1891 — Continued.

## RAILROAD CONSTRUCTION AND EQUIPMENT.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
234 days, .	-	-	1	82	303 days, .	1	345	2	386
290 days, .	-	-	1	763	304 days, .	1	156	3	300
292 days, .	1	70	-	-	305 days, .	5	1,387	2	454
293 days, .	3	378	-	-	309 days, .	1	271	-	-
294 days, .	-	-	2	110	310 days, .	-	-	1	255
295 days, .	-	-	2	359	311 days, .	1	72	-	-
299 days, .	1	92	-	-	TOTALS, .	14	2,761	14	2,709

## RUBBER AND ELASTIC GOODS.

153 days, .	1	25	-	-	277 days, .	-	-	1	11
162 days, .	-	-	1	313	280 days, .	-	-	1	323
165 days, .	-	-	1	6	282 days, .	1	1,074	1	-
200 days, .	-	-	1	8	284 days, .	-	-	-	1,180
203 days, .	1	32	-	-	290 days, .	2	79	-	-
215 days, .	-	-	1	22	293 days, .	1	1,132	-	-
245 days, .	-	-	1	15	298 days, .	2	24	-	-
256 days, .	-	-	1	58	299 days, .	1	69	2	43
257 days, .	1	642	-	-	300 days, .	4	638	6	940
263 days, .	1	14	-	-	302 days, .	1	13	-	-
265 days, .	-	-	1	241	303 days, .	2	325	-	-
269 days, .	-	-	1	192	306 days, .	9	920	6	462
270 days, .	1	2,305	-	-	307 days, .	-	-	1	54
273 days, .	-	-	2	3,860	309 days, .	1	73	-	-
275 days, .	1	250	-	-	310 days, .	-	-	1	78
276 days, .	-	-	1	51	TOTALS, .	30	7,615	30	7,857

## SCIENTIFIC INSTRUMENTS AND APPLIANCES.

250 days, .	-	-	1	3	302 days, .	2	706	1	3
282 days, .	1	24	-	-	303 days, .	-	-	1	773
285 days, .	-	-	1	26	304 days, .	1	16	2	82
287 days, .	1	4	-	-	306 days, .	3	108	3	79
292 days, .	1	17	1	20	313 days, .	1	4	-	-
300 days, .	1	14	1	5	TOTALS, .	11	893	11	991

## SHIPBUILDING.

98 days, .	1	2	-	-	180 days, .	1	3	1	3
120 days, .	-	-	1	3	200 days, .	2	5	2	10
126 days, .	1	1	1	1	204 days, .	-	-	1	-
150 days, .	1	2	3	3	208 days, .	-	-	1	1
153 days, .	1	5	-	-	225 days, .	2	4	-	-

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.

DAYS IN OPERATION—1890, 1891—Continued.

## SHIPBUILDING—Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
229 days, .	2	2	-	-	286 days, .	-	-	1	5
233 days, .	-	-	1	5	290 days, .	-	-	1	5
237 days, .	1	1	-	-	300 days, .	5	104	4	76
242 days, .	1	25	-	-	303 days, .	-	-	1	3
250 days, .	1	1	2	11	305 days, .	-	-	1	84
251 days, .	-	-	1	22	306 days, .	20	487	15	386
260 days, .	-	-	2	5	310 days, .	1	24	-	-
270 days, .	1	7	1	8	TOTALS, .	42	680	42	679
271 days, .	-	-	1	41					
280 days, .	1	7	1	7					

## SILK AND SILK GOODS.

286 days, .	-	-	1	466	297 days, .	1	463	-	-
287 days, .	-	-	1	438	300 days, .	1	35	2	184
289 days, .	1	300	-	-	301 days, .	1	46	-	-
293 days, .	1	487	-	-	306 days, .	4	937	3	801
296 days, .	-	-	2	343	TOTALS, .	9	2,268	9	2,232

## SPORTING AND ATHLETIC GOODS.

115 days, .	1	3	-	-	300 days, .	2	102	1	20
270 days, .	1	10	1	10	306 days, .	1	20	3	187
277 days, .	-	-	1	1	307 days, .	-	-	1	85
280 days, .	1	53	-	-	310 days, .	1	2	1	2
288 days, .	1	64	-	-	318 days, .	1	69	-	-
290 days, .	-	-	1	62	TOTALS, .	9	323	9	367

## STONE.

80 days, .	-	-	1	-	230 days, .	-	-	1	4
96 days, .	-	-	1	1	234 days, .	1	3	1	2
100 days, .	1	1	-	-	235 days, .	-	-	1	14
105 days, .	-	-	1	4	238 days, .	1	7	-	-
150 days, .	1	5	-	-	239 days, .	1	6	2	12
179 days, .	1	1	-	-	240 days, .	2	22	1	28
181 days, .	-	-	1	18	241 days, .	1	26	-	-
184 days, .	1	9	-	-	243 days, .	-	-	1	9
198 days, .	1	10	1	8	250 days, .	1	4	5	37
200 days, .	3	12	3	17	252 days, .	-	-	1	39
204 days, .	1	11	1	17	253 days, .	-	-	2	37
206 days, .	1	4	-	-	254 days, .	1	3	-	-
215 days, .	1	28	-	-	255 days, .	-	-	1	7
229 days, .	-	-	1	5	257 days, .	-	-	1	7

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## STONE — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
258 days, .	-	-	1	5	288 days, .	3	801	-	-
260 days, .	5	250	3	68	289 days, .	-	-	1	13
264 days, .	3	107	-	-	290 days, .	4	81	1	276
265 days, .	2	77	-	-	291 days, .	-	-	1	32
266 days, .	-	-	1	5	292 days, .	1	17	-	-
267 days, .	-	-	1	11	294 days, .	1	50	3	123
270 days, .	4	36	3	66	295 days, .	1	6	3	126
272 days, .	1	7	-	-	296 days, .	1	11	1	25
274 days, .	1	12	1	15	297 days, .	-	-	2	71
275 days, .	6	246	6	287	300 days, .	9	501	14	672
276 days, .	1	3	-	-	301 days, .	3	223	1	47
277 days, .	1	27	-	-	304 days, .	1	18	-	-
278 days, .	1	29	-	-	305 days, .	4	128	3	83
279 days, .	1	33	-	-	306 days, .	23	860	23	773
280 days, .	2	26	5	138	307 days, .	2	38	1	110
281 days, .	2	29	-	-	308 days, .	2	27	-	-
282 days, .	1	5	1	74	313 days, .	1	39	1	13
284 days, .	-	-	1	28	314 days, .	-	-	1	7
285 days, .	3	42	4	61	317 days, .	-	-	1	30
286 days, .	1	39	-	-	TOTALS, .	111	3,434	111	3,435
287 days, .	1	14	-	-					

## STRAW AND PALM LEAF GOODS.

150 days, .	1	113	-	-	260 days, .	1	113	2	200
153 days, .	-	-	1	81	264 days, .	-	-	1	114
165 days, .	-	-	1	118	278 days, .	1	64	-	-
200 days, .	-	-	1	41	280 days, .	1	88	2	156
222 days, .	1	35	-	-	282 days, .	1	123	-	-
225 days, .	2	340	2	320	292 days, .	1	141	-	-
230 days, .	-	-	1	231	295 days, .	-	-	1	118
235 days, .	1	117	-	-	300 days, .	-	-	1	352
240 days, .	1	9	1	14	305 days, .	-	-	1	83
250 days, .	-	-	2	236	306 days, .	4	765	-	-
253 days, .	1	123	-	-	TOTALS, .	17	2,073	17	2,094
257 days, .	1	42	-	-					

## TALLOW, CANDLES, SOAP, AND GREASE.

32 days, .	-	-	1	1	250 days, .	1	2	-	-
100 days, .	1	1	-	-	294 days, .	-	-	1	2
120 days, .	1	1	-	-	298 days, .	1	22	1	21
151 days, .	1	1	-	-	300 days, .	12	153	14	156
154 days, .	-	-	1	1	302 days, .	-	-	1	59
200 days, .	-	-	2	3	304 days, .	-	-	1	3

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

TALLOW, CANDLES, SOAP, AND GREASE — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
305 days, .	2	62	-	-	312 days, .	1	121	1	6
306 days, .	30	247	30	372	313 days, .	1	1	-	-
309 days, .	-	-	1	1	314 days, .	1	6	-	-
310 days, .	3	71	1	10	TOTALS, .	55	688	55	635

## TOBACCO, SNUFF, AND CIGARS.

150 days, .	-	-	1	11	291 days, .	1	102	1	12
205 days, .	1	5	-	-	292 days, .	2	35	-	-
236 days, .	1	42	-	-	294 days, .	-	-	1	13
249 days, .	1	33	-	-	296 days, .	-	-	2	159
250 days, .	1	2	2	50	297 days, .	1	47	1	29
255 days, .	-	-	1	1	298 days, .	-	-	3	188
270 days, .	1	14	-	-	299 days, .	1	37	-	-
276 days, .	1	6	-	-	300 days, .	8	628	5	373
285 days, .	-	-	1	21	302 days, .	2	68	1	49
286 days, .	1	68	1	7	303 days, .	-	-	1	146
287 days, .	1	6	-	-	306 days, .	10	156	12	212
288 days, .	1	6	-	-	TOTALS, .	35	1,275	35	1,388
290 days, .	1	20	2	117					

## TOYS AND GAMES (CHILDREN'S).

260 days, .	1	62	-	-	300 days, .	2	165	2	162
270 days, .	-	-	1	70	305 days, .	2	53	-	-
285 days, .	-	-	1	6	306 days, .	2	160	3	241
290 days, .	-	-	1	19	TOTALS, .	8	457	8	498
295 days, .	1	17	-	-					

## TRUNKS AND VALISES.

304 days, .	1	6	1	5	307 days, .	1	25	-	-
305 days, .	1	13	-	-	TOTALS, .	7	107	7	111
306 days, .	4	63	6	106					

## WHIPS, LASHES, AND STOCKS.

200 days, .	-	-	1	1	278 days, .	1	3	-	-
214 days, .	1	1	-	-	280 days, .	1	35	-	-
225 days, .	1	18	-	-	284 days, .	-	-	1	40
246 days, .	-	-	1	27	288 days, .	1	52	-	-



## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

WHIPS, LASHES, AND STOCKS — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
294 days, .	1	22	-	-	304 days, .	-	-	1	30
295 days, .	-	-	1	6	306 days, .	5	108	5	77
300 days, .	3	162	3	207	308 days, .	1	17	1	17
302 days, .	-	-	1	14	TOTALS, .	15	418	15	419

## WOODEN GOODS.

50 days, .	1	1	-	-	272 days, .	1	23	-	-
53 days, .	-	-	1	1	274 days, .	1	10	-	-
60 days, .	-	-	1	1	275 days, .	4	38	2	25
64 days, .	1	1	-	-	276 days, .	2	23	-	-
65 days, .	1	1	1	1	279 days, .	-	-	1	5
75 days, .	2	2	1	1	280 days, .	5	101	3	72
80 days, .	1	5	-	-	285 days, .	1	28	1	14
145 days, .	1	2	1	2	286 days, .	-	-	1	20
153 days, .	-	-	3	7	287 days, .	2	18	1	13
156 days, .	1	1	-	-	288 days, .	1	25	-	-
157 days, .	-	-	1	11	290 days, .	6	161	5	140
169 days, .	-	-	1	1	291 days, .	-	-	1	12
175 days, .	1	15	1	1	292 days, .	1	12	2	16
179 days, .	1	1	-	-	294 days, .	1	58	1	16
180 days, .	1	1	-	-	295 days, .	-	-	2	35
190 days, .	1	2	2	22	296 days, .	1	10	-	-
200 days, .	3	46	5	54	297 days, .	1	98	-	-
206 days, .	-	-	1	34	299 days, .	2	29	2	108
225 days, .	1	8	-	-	300 days, .	28	679	35	677
210 days, .	-	-	1	1	301 days, .	-	-	1	95
235 days, .	1	133	-	-	302 days, .	2	58	-	-
240 days, .	-	-	2	24	303 days, .	-	-	2	113
243 days, .	-	-	1	2	304 days, .	1	16	2	32
245 days, .	-	-	1	166	305 days, .	1	9	5	36
246 days, .	1	2	-	-	306 days, .	56	887	42	948
247 days, .	1	33	-	-	307 days, .	1	17	-	-
248 days, .	-	-	1	25	308 days, .	3	160	1	65
250 days, .	1	8	2	20	310 days, .	1	1	1	2
254 days, .	-	-	1	35	311 days, .	-	-	2	71
260 days, .	2	29	1	11	312 days, .	1	80	-	-
265 days, .	2	15	-	-	313 days, .	1	31	1	10
267 days, .	-	-	1	6	TOTALS, .	149	2,888	149	3,012
270 days, .	1	10	5	61					

## WOOLLEN GOODS.

90 days, .	1	13	-	-	147 days, .	-	-	1	22
121 days, .	1	4	-	-	175 days, .	1	32	-	-
123 days, .	1	7	-	-	181 days, .	1	52	-	-

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.

DAYS IN OPERATION—1890, 1891—Continued.

WOOLLEN GOODS—Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
183 days, .	-	-	2	70	272 days, .	8	277	-	-
195 days, .	-	-	1	27	274 days, .	1	222	-	-
200 days, .	2	84	1	15	275 days, .	1	198	2	262
201 days, .	-	-	1	40	276 days, .	1	90	1	51
204 days, .	1	61	-	-	277 days, .	-	-	1	343
205 days, .	2	80	-	-	280 days, .	3	88	2	20
209 days, .	1	73	-	-	283 days, .	2	455	-	-
212 days, .	1	5	-	-	285 days, .	1	35	1	50
217 days, .	1	32	-	-	286 days, .	1	41	-	-
222 days, .	-	-	1	60	287 days, .	1	146	1	123
223 days, .	1	8	-	-	288 days, .	2	128	-	-
224 days, .	1	37	-	-	289 days, .	1	138	1	34
225 days, .	1	63	-	-	290 days, .	-	-	4	751
226 days, .	-	-	1	41	291 days, .	-	-	2	146
228 days, .	1	73	-	-	292 days, .	-	-	1	26
230 days, .	-	-	1	76	293 days, .	2	121	1	13
235 days, .	-	-	1	51	294 days, .	5	537	2	67
239 days, .	1	12	1	12	295 days, .	2	581	3	692
240 days, .	1	24	-	-	296 days, .	1	44	1	37
243 days, .	-	-	1	14	297 days, .	1	123	-	-
244 days, .	1	14	1	18	298 days, .	1	38	-	-
247 days, .	-	-	1	34	299 days, .	1	407	-	-
250 days, .	1	119	2	41	300 days, .	16	2,093	20	1,922
252 days, .	-	-	1	71	301 days, .	2	443	2	351
253 days, .	-	-	1	17	302 days, .	-	-	3	760
255 days, .	-	-	1	35	303 days, .	3	378	7	655
257 days, .	1	312	-	-	304 days, .	6	739	4	748
258 days, .	1	18	-	-	305 days, .	6	865	4	294
260 days, .	2	41	1	119	306 days, .	37	4,817	37	4,768
263 days, .	-	-	1	9	307 days, .	3	490	9	2,649
264 days, .	-	-	1	75	308 days, .	2	222	-	-
265 days, .	1	15	-	-	309 days, .	3	1,422	2	937
267 days, .	1	11	-	-	310 days, .	1	246	2	616
268 days, .	1	224	-	-	TOTALS, .	138	16,816	138	17,479
270 days, .	1	23	3	317					

## WORSTED GOODS.

248 days, .	1	18	-	-	304 days, .	2	367	3	1,916
258 days, .	1	23	-	-	305 days, .	1	112	2	783
291 days, .	1	148	-	-	306 days, .	10	6,014	7	1,605
296 days, .	-	-	1	8	307 days, .	1	127	2	2,567
300 days, .	-	-	2	598	308 days, .	2	424	2	296
301 days, .	1	654	1	146	312 days, .	1	76	-	-
302 days, .	-	-	1	46	TOTALS, .	21	7,963	21	7,965

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

DAYS IN OPERATION — 1890, 1891 — Continued.

## ALL INDUSTRIES.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
10 days, .	1	1	-	-	135 days, .	-	-	1	4
18 days, .	1	1	1	1	136 days, .	1	2	-	-
23 days, .	1	1	-	-	137 days, .	1	81	-	-
25 days, .	-	-	1	1	140 days, .	8	40	3	21
30 days, .	1	1	2	2	143 days, .	2	23	-	-
32 days, .	-	-	1	1	144 days, .	2	131	-	-
38 days, .	-	-	1	11	145 days, .	1	2	1	2
40 days, .	2	20	-	-	146 days, .	-	-	1	38
45 days, .	1	1	1	7	147 days, .	-	-	1	22
50 days, .	2	2	1	1	149 days, .	-	-	1	9
51 days, .	-	-	1	15	150 days, .	23	274	29	209
52 days, .	1	1	1	1	151 days, .	1	1	1	10
53 days, .	-	-	1	1	152 days, .	1	6	1	2
60 days, .	2	3	1	1	153 days, .	12	152	11	184
64 days, .	2	2	-	-	154 days, .	2	25	11	65
65 days, .	2	6	1	1	155 days, .	-	-	2	38
70 days, .	1	91	1	34	156 days, .	5	72	3	23
74 days, .	1	3	-	-	157 days, .	-	-	1	11
75 days, .	4	5	3	5	159 days, .	-	-	1	11
76 days, .	1	1	2	157	160 days, .	5	62	2	5
77 days, .	1	1	-	-	161 days, .	1	13	-	-
78 days, .	-	-	3	3	162 days, .	2	53	2	330
80 days, .	1	5	3	2	163 days, .	-	-	1	25
90 days, .	2	14	4	28	165 days, .	2	64	3	155
91 days, .	1	1	-	-	166 days, .	1	22	-	-
93 days, .	1	40	-	-	168 days, .	-	-	2	22
95 days, .	1	25	-	-	169 days, .	-	-	1	1
96 days, .	1	2	1	1	172 days, .	1	82	-	-
100 days, .	9	58	9	30	174 days, .	1	66	2	23
101 days, .	1	1	-	-	175 days, .	4	62	5	100
102 days, .	1	4	3	12	176 days, .	-	-	2	135
103 days, .	-	-	1	6	178 days, .	-	-	1	3
104 days, .	2	7	3	11	179 days, .	4	5	2	87
105 days, .	-	-	1	4	180 days, .	14	155	7	160
106 days, .	-	-	1	5	181 days, .	1	52	1	18
108 days, .	-	-	2	2	182 days, .	2	28	4	75
110 days, .	-	-	2	22	183 days, .	-	-	1	362
113 days, .	-	-	1	5	184 days, .	1	9	1	5
115 days, .	1	3	-	-	185 days, .	2	28	-	-
117 days, .	-	-	1	4	186 days, .	-	-	1	24
120 days, .	2	2	1	3	190 days, .	2	5	6	71
121 days, .	2	103	-	-	192 days, .	1	11	-	-
123 days, .	1	7	1	1	193 days, .	2	11	-	-
125 days, .	2	19	2	5	194 days, .	1	25	-	-
126 days, .	2	44	2	7	195 days, .	-	-	4	73
130 days, .	2	27	4	59	197 days, .	-	-	1	75

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.

DAYS IN OPERATION—1890, 1891—Continued.

ALL INDUSTRIES—Continued.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
198 days, .	1	10	1	8	246 days, .	7	318	2	42
200 days, .	40	696	49	612	247 days, .	8	106	9	318
201 days, .	-	-	2	41	248 days, .	4	181	4	440
202 days, .	1	4	1	26	249 days, .	2	36	2	60
203 days, .	1	32	1	9	250 days, .	47	1,454	60	1,619
204 days, .	8	195	5	25	251 days, .	-	-	3	230
205 days, .	7	132	3	18	252 days, .	2	195	4	325
206 days, .	2	25	3	45	253 days, .	1	123	10	326
207 days, .	1	3	1	4	254 days, .	5	80	3	226
208 days, .	3	299	5	13	255 days, .	7	572	8	495
209 days, .	2	118	-	-	256 days, .	4	44	6	177
210 days, .	2	11	4	69	257 days, .	3	996	5	179
212 days, .	1	5	1	16	258 days, .	7	297	4	182
213 days, .	2	23	1	44	259 days, .	-	-	3	84
214 days, .	2	12	2	28	260 days, .	43	2,984	41	1,094
215 days, .	3	83	4	118	261 days, .	2	99	1	46
216 days, .	1	3	-	-	262 days, .	3	563	2	183
217 days, .	1	32	2	103	263 days, .	3	109	7	277
218 days, .	2	180	-	-	264 days, .	7	729	6	490
219 days, .	1	20	-	-	265 days, .	17	803	10	635
220 days, .	6	820	9	188	266 days, .	4	320	4	326
221 days, .	1	7	-	-	267 days, .	5	100	5	299
222 days, .	1	35	2	140	268 days, .	3	270	6	260
223 days, .	1	8	-	-	269 days, .	1	21	3	435
224 days, .	2	42	2	40	270 days, .	38	3,461	43	1,875
225 days, .	16	857	12	574	271 days, .	1	28	2	57
226 days, .	3	22	2	55	272 days, .	11	1,017	3	295
227 days, .	-	-	4	135	273 days, .	3	456	9	4,319
228 days, .	6	240	6	656	274 days, .	6	571	5	311
229 days, .	7	571	3	104	275 days, .	65	3,033	62	2,857
230 days, .	8	459	16	1,033	276 days, .	17	643	11	1,001
231 days, .	2	96	6	95	277 days, .	7	453	6	408
232 days, .	1	55	4	113	278 days, .	10	1,155	11	895
233 days, .	1	20	2	48	279 days, .	8	433	6	380
234 days, .	7	94	7	98	280 days, .	72	4,270	91	4,610
235 days, .	5	433	5	198	281 days, .	6	228	7	232
236 days, .	5	161	2	56	282 days, .	23	3,802	9	879
237 days, .	2	80	1	46	283 days, .	8	931	8	921
238 days, .	-	-	2	34	284 days, .	9	1,295	11	1,723
239 days, .	6	129	7	91	285 days, .	19	1,083	47	3,470
240 days, .	32	1,342	26	987	286 days, .	19	1,059	17	1,789
241 days, .	2	64	-	-	287 days, .	15	2,831	15	1,395
242 days, .	2	62	-	-	288 days, .	33	2,875	22	1,384
243 days, .	-	-	6	171	289 days, .	11	1,526	9	342
244 days, .	5	106	5	243	290 days, .	96	8,788	85	7,313
245 days, .	4	169	7	477	291 days, .	14	1,899	14	1,169

PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.  
 DAYS IN OPERATION — 1890, 1891 — Continued.

## ALL INDUSTRIES — Concluded.

DAYS IN OPERATION.	1890		1891		DAYS IN OPERATION.	1890		1891	
	Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed		Estab- lish- ments	Persons Em- ployed	Estab- lish- ments	Persons Em- ployed
292 days, .	31	3,600	18	1,817	309 days, .	26	3,621	25	4,734
293 days, .	17	3,176	10	863	310 days, .	38	1,379	30	1,737
294 days, .	39	3,853	35	4,425	311 days, .	5	365	10	1,046
295 days, .	38	4,535	51	5,338	312 days, .	12	534	12	4,016
296 days, .	26	3,176	25	2,238	313 days, .	42	1,159	29	6,321
297 days, .	24	5,297	10	906	314 days, .	1	6	1	7
298 days, .	35	7,140	26	3,197	315 days, .	1	3	2	88
299 days, .	18	2,425	23	4,213	316 days, .	-	-	1	10
300 days, .	554	37,504	564	32,513	317 days, .	1	3	2	33
301 days, .	37	5,632	29	4,241	322 days, .	1	12	-	-
302 days, .	45	9,187	44	4,063	336 days, .	1	3	1	3
303 days, .	44	6,311	58	9,345	337 days, .	-	-	4	24
304 days, .	78	11,659	86	14,596	350 days, .	1	8	-	-
305 days, .	124	13,558	117	15,928	360 days, .	1	16	1	11
306 days, .	1,368	84,511	1,308	89,233	365 days, .	12	201	13	234
307 days, .	44	9,127	69	19,692					
308 days, .	47	7,783	43	4,908	TOTALS, .	3,745	287,900	3,745	292,866

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

## DAYS IN OPERATION — 1890, 1891 — Continued.

## RECAPITULATION. DAYS IN OPERATION — 1890, 1891.

[In this recapitulation is shown the average number of days in operation, for each establishment in the industries represented, on the basis of establishments and also on the basis of persons employed. In previous reports the first mentioned basis was the only one used. It is evident, however, that, so far as employment is concerned, an average based upon persons employed is more indicative than one based upon the number of establishments, for, in the latter case, an establishment with a thousand employes would have no more influence in determining the average than an establishment employing but ten persons, therefore, the method based upon the number of persons employed has been adopted. For purposes of comparison, however, averages are here shown on both bases.]

INDUSTRIES.	Number of Establishments Considered	AVERAGE NUMBER OF DAYS IN OPERATION			
		On the Basis of Establishments		On the Basis of Persons Employed	
		1890	1891	1890	1891
Agricultural implements, . . . . .	11	267.91	256.09	293.25	285.21
Arms and ammunition, . . . . .	12	301.00	299.50	300.38	299.18
Artisans' tools, . . . . .	56	296.29	284.39	294.10	297.04
Awnings, sails, tents, etc., . . . . .	30	269.17	253.73	289.97	284.32
Boots and shoes, . . . . .	567	284.80	284.65	288.72	288.84
Boxes (paper and wooden), . . . . .	141	287.64	279.48	294.17	291.15
Brick, tiles, and sewer pipe, . . . . .	45	208.40	204.31	227.77	226.08
Brooms, brushes, and mops, . . . . .	21	289.67	277.52	301.99	300.64
Burial cases, caskets, coffins, etc., . . . . .	6	306.17	305.50	305.78	306.05
Buttons and dress trimmings, . . . . .	17	299.53	295.82	300.28	299.46
Carpetings, . . . . .	12	281.50	299.42	297.23	301.42
Carriages and wagons, . . . . .	96	296.41	287.24	298.17	294.50
Cement, kaolin, lime, and plaster, . . . . .	4	302.25	298.00	304.56	300.34
Chemical preparations (compounded), . . . . .	9	265.89	267.56	302.39	288.50
Clocks, watches, and jewelry, . . . . .	77	287.31	279.83	287.93	282.19
Clothing, . . . . .	113	288.84	288.44	296.95	294.54
Cooking, lighting, and heating apparatus, . . . . .	31	274.68	270.74	274.39	279.06
Cordage and twine, . . . . .	25	284.24	293.00	287.83	294.09
Corks, bungs, and taps, . . . . .	4	304.25	296.50	303.64	297.02
Cotton goods, . . . . .	157	292.29	295.57	299.05	304.16
Cotton, woollen, and other textiles, . . . . .	3	283.00	308.67	301.88	312.40
Crayons, pencils, crucibles, etc., . . . . .	4	305.25	300.25	303.73	298.35
Drugs and medicines, . . . . .	19	299.05	297.95	302.48	302.10
Dyestuffs, . . . . .	7	299.00	293.29	283.37	277.52
Earthen, plaster, and stone ware, . . . . .	4	297.75	268.00	295.57	256.52
Electrical apparatus and appliances, . . . . .	5	305.20	305.60	302.24	305.96
Electroplating, . . . . .	10	292.10	299.00	280.35	294.68
Emery and sand paper and cloth, etc., . . . . .	13	286.38	300.69	293.08	303.35
Fancy articles, . . . . .	6	291.67	300.17	294.43	299.32
Fertilizers, . . . . .	7	281.57	279.29	271.26	263.13
Fine arts and taxidermy, . . . . .	2	306.00	306.00	306.00	306.00
Fireworks and matches, . . . . .	3	283.33	290.33	277.23	292.08
Flax, hemp, jute, and linen goods, . . . . .	8	296.25	298.13	302.10	301.35
Food preparations, . . . . .	264	294.36	290.77	295.56	301.57
Furniture, . . . . .	120	290.59	290.92	298.34	298.17
Glass, . . . . .	10	297.60	285.00	278.94	284.48
Glue, isinglass, and starch, . . . . .	14	247.29	244.36	275.03	241.60

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES—Continued.

DAYS IN OPERATION—1890, 1891—Continued.

RECAPITULATION. DAYS IN OPERATION—1890, 1891  
—Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE NUMBER OF DAYS IN OPERATION			
		On the Basis of Establishments		On the Basis of Persons Employed	
		1890	1891	1890	1891
Hair work (animal and human), . . .	10	284.00	274.40	291.44	297.29
Hose: rubber, linen, etc., . . . . .	5	260.20	258.80	286.08	298.74
Hosiery and knit goods, . . . . .	40	260.25	261.35	297.53	300.17
Ink, mucilage, and paste, . . . . .	8	287.00	286.13	302.45	301.40
Ivory, bone, shell, and horn goods, etc., .	13	298.54	300.85	299.16	299.17
Leather, . . . . .	154	292.23	284.86	294.08	289.46
Liquors and beverages (not spirituous), .	12	284.50	300.58	295.93	304.89
Liquors: malt, distilled, and fermented,	49	231.49	245.73	297.17	303.68
Lumber, . . . . .	25	289.40	283.96	290.31	278.78
Machines and machinery, . . . . .	263	301.65	299.48	304.22	303.22
Metals and metallic goods, . . . . .	277	292.50	292.33	296.99	297.73
Mixed textiles, . . . . .	13	293.92	289.23	293.15	289.98
Models and patterns, . . . . .	5	305.80	306.00	305.93	306.00
Musical instruments and materials, . .	46	298.35	290.57	296.43	296.09
Oils and illuminating fluids, . . . . .	9	303.33	305.56	306.28	306.11
Paints, colors, and crude chemicals, . .	16	286.25	288.56	295.69	298.11
Paper and paper goods, . . . . .	102	288.96	290.19	296.91	299.60
Perfumes, toilet articles, etc., . . . .	4	303.00	304.50	304.46	305.17
Photographs and photographic materials,	11	305.91	304.09	306.15	304.73
Polishes and dressing, . . . . .	18	295.83	303.22	301.71	301.72
Printing, publishing, and bookbinding, .	24	301.25	302.63	301.40	303.64
Print works, dye works, and bleacheries,	37	293.70	289.24	296.93	294.92
Railroad construction and equipment, .	14	301.57	295.71	303.06	296.93
Rubber and elastic goods, . . . . .	30	288.07	276.37	282.76	275.62
Scientific instruments and appliances, .	11	300.00	296.18	301.74	302.45
Shipbuilding, . . . . .	42	267.19	261.60	297.54	294.52
Silk and silk goods, . . . . .	9	300.44	298.11	298.93	296.06
Sporting and athletic goods, . . . . .	9	275.78	296.89	294.90	302.16
Stone, . . . . .	111	276.75	274.92	288.64	289.92
Straw and palm leaf goods, . . . . .	17	260.18	246.00	267.51	252.17
Tallow, candles, soap, and grease, . .	55	294.15	292.64	304.91	302.80
Tobacco, snuff, and cigars, . . . . .	35	290.63	291.46	294.42	296.21
Toys and games (children's), . . . . .	8	297.13	295.38	297.07	298.12
Trunks and valises, . . . . .	7	305.71	305.71	306.00	305.91
Whips, lashes, and stocks, . . . . .	15	287.80	291.27	294.80	296.46
Wooden goods, . . . . .	149	280.09	277.05	292.17	290.29
Woollen goods, . . . . .	138	282.51	288.84	293.48	298.42
Worsted goods, . . . . .	21	300.29	304.43	305.11	305.24
ALL INDUSTRIES, . . . . .	3,745	287.37	285.67	295.44	296.71

## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Continued.

## DAYS IN OPERATION — 1890, 1891 — Continued.

## COMBINED RECAPITULATION. PERCENTAGES, AND DAYS IN OPERATION — 1890, 1891.

[In this recapitulation, the average percentages of proportion of business done (pages 180 and 181) and the average number of days in operation (pages 211 and 212) are brought forward for comparison. The average number of days in operation is based upon persons employed as explained in the head-note on page 211.]

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGES			
		Percentages		Days in Operation	
		1890	1891	1890	1891
Agricultural implements, . . . .	11	60.36	56.73	298.25	285.21
Arms and ammunition, . . . .	12	63.33	68.17	300.38	299.18
Artisans' tools, . . . .	56	68.73	66.43	294.10	297.04
Awnings, sails, tents, etc., . . .	30	50.37	48.67	289.97	284.32
Boots and shoes, . . . .	567	70.21	66.06	288.72	288.84
Boxes (paper and wooden), . . .	141	69.39	67.22	294.17	291.16
Brick, tiles, and sewer pipe, . . .	45	77.09	81.98	227.77	226.08
Brooms, brushes, and mops, . . .	21	61.57	64.43	301.99	300.64
Burial cases, caskets, coffins, etc., . .	6	78.33	85.00	305.78	306.05
Buttons and dress trimmings, . . .	17	61.65	64.29	300.28	299.46
Carpetings, . . . .	12	78.25	80.83	297.23	301.42
Carriages and wagons, . . . .	96	70.06	67.50	298.17	294.50
Cement, kaolin, lime, and plaster, . .	4	76.50	78.50	304.56	300.34
Chemical preparations (compounded), .	9	60.00	63.00	302.39	288.50
Clocks, watches, and jewelry, . . .	77	66.30	63.90	287.93	282.19
Clothing, . . . .	118	75.51	72.88	296.95	294.54
Cooking, lighting, and heating apparatus,	31	70.16	72.55	274.89	279.06
Cordage and twine, . . . .	25	73.20	75.96	287.83	294.09
Corks, bungs, and taps, . . . .	4	67.50	65.00	303.64	297.02
Cotton goods, . . . .	157	91.23	91.97	299.05	304.16
Cotton, woollen, and other textiles, .	3	67.33	61.67	301.88	312.40
Crayons, pencils, crucibles, etc., . .	4	73.75	71.50	303.73	298.35
Drugs and medicines, . . . .	19	57.37	60.26	302.48	302.10
Dyestuffs, . . . .	7	66.00	63.00	283.37	277.52
Earthen, plaster, and stone ware, . .	4	88.75	87.50	295.57	256.52
Electrical apparatus and appliances, .	5	77.00	71.40	302.24	305.96
Electroplating, . . . .	10	55.50	57.70	280.35	294.68
Emery and sand paper and cloth, etc., .	13	72.69	78.08	293.08	303.35
Fancy articles, . . . .	6	77.33	74.67	294.43	299.32
Fertilizers, . . . .	7	65.71	65.00	271.26	263.13
Fine arts and taxidermy, . . . .	2	100.00	85.00	306.00	306.00
Fireworks and matches, . . . .	3	71.67	70.00	277.23	292.08
Flax, hemp, jute, and linen goods, . .	8	85.13	84.00	302.10	301.35
Food preparations, . . . .	264	62.00	62.43	295.56	301.57
Furniture, . . . .	120	68.02	66.33	298.34	298.17
Glass, . . . .	10	67.60	63.80	278.94	284.48
Glue, isinglass, and starch, . . .	14	75.36	82.00	275.03	241.60
Hair work (animal and human), . . .	10	59.30	62.80	291.44	297.29
Hose: rubber, linen, etc., . . .	5	54.40	68.00	286.08	298.74
Hosiery and knit goods, . . . .	40	62.63	63.15	297.53	300.17



## PROPORTION OF BUSINESS DONE: BY INDUSTRIES — Concluded.

DAYS IN OPERATION — 1890, 1891 — Concluded.

## COMBINED RECAPITULATION. PERCENTAGES, AND DAYS IN OPERATION — 1890, 1891 — Concluded.

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGES			
		Percentages		Days in Operation	
		1890	1891	1890	1891
Ink, mucilage, and paste, . . . . .	8	53.75	51.50	302.45	301.40
Ivory, bone, shell, and horn goods, etc., .	18	76.77	78.62	299.16	299.17
Leather, . . . . .	154	70.71	64.42	294.08	289.46
Liquors and beverages (not spirituous), .	12	64.17	65.88	295.93	304.89
Liquors: malt, distilled, and fermented,	49	53.82	61.55	297.17	303.68
Lumber, . . . . .	25	73.88	76.00	290.31	278.78
Machines and machinery, . . . . .	263	69.27	67.54	304.22	303.22
Metals and metallic goods, . . . . .	277	69.26	70.60	296.99	297.73
Mixed textiles, . . . . .	13	82.08	86.92	293.15	289.98
Models and patterns, . . . . .	5	73.00	73.60	305.93	306.00
Musical instruments and materials, .	46	74.76	72.83	296.43	298.09
Oils and illuminating fluids, . . . . .	9	70.56	62.11	306.28	306.11
Paints, colors, and crude chemicals, .	16	61.69	61.69	295.69	298.11
Paper and paper goods, . . . . .	102	84.00	84.62	296.91	299.60
Perfumes, toilet articles, etc., . . . . .	4	86.25	88.75	304.46	305.17
Photographs and photographic materials,	11	84.55	74.09	306.15	304.73
Polishes and dressing, . . . . .	18	71.17	70.06	301.71	301.72
Printing, publishing, and bookbinding, .	24	74.13	70.29	301.40	303.64
Print works, dye works, and bleacheries,	37	73.46	69.49	296.93	294.92
Railroad construction and equipment, .	14	87.00	87.29	303.06	296.93
Rubber and elastic goods, . . . . .	30	73.20	68.77	282.76	275.62
Scientific instruments and appliances, .	11	71.86	70.00	301.74	302.45
Shipbuilding, . . . . .	42	50.90	54.12	297.54	294.52
Silk and silk goods, . . . . .	9	78.44	80.56	298.93	296.06
Sporting and athletic goods, . . . . .	9	59.89	58.33	294.90	302.16
Stone, . . . . .	111	61.06	62.47	288.64	289.92
Straw and palm leaf goods, . . . . .	17	67.88	72.24	267.51	252.17
Tallow, candles, soap, and grease, . .	55	70.47	64.35	304.91	302.80
Tobacco, snuff, and cigars, . . . . .	35	64.60	70.00	294.42	296.21
Toys and games (children's), . . . . .	8	70.88	77.13	297.07	298.12
Trunks and valises, . . . . .	7	75.00	81.43	306.00	305.91
Whips, lashes, and stocks, . . . . .	15	71.47	77.47	294.80	296.46
Wooden goods, . . . . .	149	64.58	61.58	292.17	290.29
Woollen goods, . . . . .	138	82.61	84.38	293.48	298.42
Worsted goods, . . . . .	21	88.24	88.29	305.11	305.24
ALL INDUSTRIES, . . . . .	3,745	70.27	69.27	295.44	296.71





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# ANALYSIS.

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## ANALYSIS.

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The Annual Statistics of Manufactures present statistical comparisons for the principal establishments in the leading industries making consecutive yearly returns. These returns it will be understood are, in each year compared, secured from the same establishments, and are made upon the same basis in each year. Such comparisons, therefore, more accurately show the trend of business from year to year, and indicate the condition of the different industries more definitely than would be possible if based upon returns from different establishments in each year compared, or confined to certain selected years or arbitrarily fixed periods, as is necessarily the case in comparisons drawn from the census. On the other hand, these yearly reports do not present aggregates for the entire industries considered. Such aggregates can only be obtained from the census. But we have clearly shown in previous years, supporting our contention by data drawn from the census, that so far as portraying the conditions surrounding production and exhibiting the condition of the different industries, these annual comparisons, covering a large percentage of the output and including the leading industrial establishments, are typical, and may be accepted as trustworthy.

It should be borne in mind however that, throughout this report, wherever "All Industries" are mentioned, the industries enumerated in the first table are referred to; and wherever aggregates for All Industries of capital invested, stock used, goods made, persons employed, or wages paid are referred to, only the aggregates derived from the returns of the 3,745 leading establishments, which made returns for each of the years 1890 and 1891, and for which it is possible to make comparisons, should be understood, unless some other meaning is distinctly stated in the text.

## PRIVATE FIRMS AND CORPORATIONS; PARTNERS AND STOCKHOLDERS: BY INDUSTRIES.

### PRIVATE FIRMS AND CORPORATIONS.

Statistical presentations relating to private firms and corporations and partners and stockholders are given upon pages 4 to 15. There are 3,745 establishments considered, each of which made returns for the years 1890 and 1891. These establishments, in 1890, comprised 2,987 private firms and 730 corporations; in 1891 they were managed by 2,952 private firms and 762 corporations. It is necessary to repeat here the information contained in the head-note to the tables on pages 4, 5, 8, and 9, namely, that there are duplications in the columns devoted to the number of private firms and the number of corporations. They are caused by the fact that the same firm or corporation is found engaged in manufacturing in two or more establishments located in different towns and sometimes in different industries. This condition of affairs is largely due to the absorption of private firms by corporations that is constantly taking place, the establishments thus absorbed being, in many cases, located in different towns. In the tables, each establishment, whether managed in connection with another or not, has been considered one establishment and the whole number of private firms and corporations has been credited to each industry; but they are counted once only in making up the total for All Industries.

In order to bring directly before the eye of the reader the effect in the aggregate of the change from private firms to corporations in 1891 as compared with 1890 the following table is presented:

PRIVATE FIRMS AND CORPORATIONS.	NUMBER		PERCENTAGES	
	1890	1891	1890	1891
Private firms, . . . . .	2,987	2,952	80.36	79.48
Corporations, . . . . .	730	762	19.64	20.52
TOTALS, . . . . .	3,717	3,714	100.00	100.00

The numerical effect of the change has just been noted. Upon the basis of percentages, the private firms in 1890 represented 80.36 per cent of all the establishments considered and the corporations 19.64 per cent. In 1891 the private firms represented 79.48 per cent and the corporations 20.52 per cent. The percentages of decrease and increase are quite small, but they exhibit the tendency to change from the private firm to the corporate basis which has been noted from year to year and which still continues.

The duplications in private firms and corporations are shown in the following table :

PRIVATE FIRMS AND CORPORATIONS.	NUMBER OF ESTABLISHMENTS	
	1890	1891
Private firms, . . . . .	8	10
Corporations, . . . . .	20	21
TOTALS, . . . . .	28	31

From the above table it appears that in the statistical presentations relating to establishments 28 duplications occur in 1890 and 31 in 1891. These duplications refer to the same concerns in each year. The excess in 1891 of three duplications over the number shown in 1890 indicates a change in the management of old establishments by which certain firms increased the number of establishments carried on by them in 1891 over the number which they controlled in 1890.

It should be understood, however, that only the number of establishments, and partners and stockholders are affected by these duplications. The statistical returns concerning stock used, goods made, persons employed, and wages paid, are made separately by the manufacturers for each establishment and are credited to the city, town, or industry to which they properly belong.

#### PARTNERS AND STOCKHOLDERS.

Partners and stockholders are in some cases duplicated for the reason that the same body of partners and stockholders is



sometimes connected with two or more establishments in the same or in different cities and towns; and, therefore, under the plan of classification adopted by this office, it has been deemed expedient to credit the whole body of partners and stockholders to each industry but to count them once only in making up the total for All Industries.

The duplications in partners and stockholders are shown in the following table :

PARTNERS AND STOCKHOLDERS.	1890	1891
Males, . . . . .	902	915
Females, . . . . .	636	626
Banks, trustees, etc., . . . . .	480	530
TOTALS, . . . . .	2,018	2,071

The number of general partners, the number of special partners, and the number of estates, etc., concerned in the management of the private firms represented in 1890 and 1891 are shown in the following table with percentages :

PARTNERS.	NUMBER		PERCENTAGES	
	1890	1891	1890	1891
General partners, . . . . .	4,843	4,770	98.66	98.88
Special partners, . . . . .	57	45	1.16	0.93
Estates, etc., . . . . .	9	9	0.18	0.19
TOTALS, . . . . .	4,909	4,824	100.00	100.00

The percentages for each class of partners represented do not materially differ in either year. Of the whole body, 98.66 per cent in 1890 and 98.88 per cent in 1891 were general partners, actively and directly engaged in administering the affairs of the firms with which they were connected.

A classification of partners by sex, together with the number of estates is shown in the following table for each year with percentages :

PARTNERS.	NUMBER		PERCENTAGES	
	1890	1891	1890	1891
Males, . . . . .	4,775	4,693	97.27	97.28
Females, . . . . .	125	122	2.55	2.53
Estates, etc., . . . . .	9	9	0.18	0.19
TOTALS, . . . . .	4,909	4,824	100.00	100.00

No material change is noted in 1891 as compared with 1890 in the distribution of partners by sex. Less than one per cent of the whole body consists of estates and less than three per cent are females.

A classification of stockholders by sex appears in the following presentation :

STOCKHOLDERS.	NUMBER		PERCENTAGES	
	1890	1891	1890	1891
Males, . . . . .	21,517	22,487	60.74	59.76
Females, . . . . .	10,618	11,479	29.97	30.51
Banks, trustees, etc., . . . . .	3,290	3,661	9.29	9.73
TOTALS, . . . . .	35,425	37,627	100.00	100.00

A very slight increase appears in the foregoing table in the number of females represented among the stockholders, the percentage of the whole body in 1890 being 29.97 and the percentage in 1891 being 30.51. The number of banks, trustees, etc., constitutes about the same percentage of the total body of stockholders in each year, these percentages being 9.29 in 1890 and 9.73 in 1891. Male stockholders constitute 60.74 per cent of the whole body in 1890 and 59.76 per cent in 1891.

In the following table partners and stockholders are consolidated for the purpose of contrasting the relative positions of the sexes controlling the aggregate number of establishments represented in the returns :

PARTNERS AND STOCKHOLDERS.	NUMBER		PERCENTAGES	
	1890	1891	1890	1891
Males, . . . . .	26,292	27,180	65.19	64.03
Females, . . . . .	10,743	11,601	26.64	27.33
Banks, trustees, etc., . . . . .	3,299	3,670	8.17	8.64
TOTALS, . . . . .	40,334	42,451	100.00	100.00

The total number of partners and stockholders represented in the foregoing table is 40,334 in 1890 and 42,451 in 1891, a numerical increase of 2,117; but the proportions of the sexes represented remain practically the same in each year, a very slight percentage of increase appearing in the number of females represented.

The aggregate number of partners and stockholders, without regard to sex, is next brought forward with percentages:

PARTNERS AND STOCKHOLDERS.	NUMBER		PERCENTAGES	
	1890	1891	1890	1891
Partners, . . . . .	4,909	4,824	12.17	11.36
Stockholders, . . . . .	35,425	37,627	87.83	88.64
TOTALS, . . . . .	40,334	42,451	100.00	100.00

From the above presentation it appears that the partners represent 12.17 per cent of the entire body of partners and stockholders in control of the establishments in 1890 and 11.36 per cent in 1891. In 1890, 87.83 per cent of the entire number of persons managing these establishments were stockholders in corporations; in 1891 this percentage had become 88.64, a very slight increase, but again exhibiting the tendency previously alluded to of change in the management of productive enterprises from the private firm to the corporate basis.

In the following table the corporations are classified ranging from those having 49 stockholders or less to those having 500 or more:

CLASSIFICATION OF STOCKHOLDERS.	NUMBER		PERCENTAGES	
	1890	1891	1890	1891
Under 50, . . . . .	6,628	7,137	18.71	18.97
50 but under 100, . . . . .	5,085	4,972	14.35	13.21
100 but under 150, . . . . .	2,384	2,249	6.73	5.98
150 but under 200, . . . . .	2,248	2,192	6.35	5.83
200 but under 250, . . . . .	2,021	2,242	5.71	5.96
250 but under 300, . . . . .	2,634	3,193	7.44	8.49
300 but under 350, . . . . .	943	942	2.66	2.50
350 but under 400, . . . . .	2,948	3,350	8.32	8.90
400 but under 450, . . . . .	3,816	3,443	10.77	9.15
450 but under 500, . . . . .	471	950	1.33	2.52
500 and over, . . . . .	6,232	6,942	17.59	18.45
Railroad corporations, . . . . .	10	10	0.03	0.03
Syndicates, . . . . .	5	5	0.01	0.01
TOTALS, . . . . .	35,425	37,627	100.00	100.00

This presentation permits a comparison as to the relative number of stockholders represented in the different corporations. In 1890, 18.71 per cent of the total number were stockholders who were in corporations having 49 stockholders or less. In 1891, practically the same proportion continued, the percentage being 18.97. About the same proportion of the total number were in corporations each having 500 or more stockholders, the percentage of the total number in 1890 being 17.59 and in 1891, 18.45. Together, these two classes of corporations comprised in each year slightly more than one-third of the total number of stockholders.

A more condensed classification is presented in the following table :

CLASSIFICATION OF STOCKHOLDERS.	NUMBER		PERCENTAGES	
	1890	1891	1890	1891
Under 100, . . . . .	11,713	12,109	33.06	32.18
100 but under 300, . . . . .	9,287	9,876	26.22	26.25
300 and over, . . . . .	14,410	15,627	40.68	41.53
Railroad corporations, . . . . .	10	10	0.03	0.03
Syndicates, . . . . .	5	5	0.01	0.01
TOTALS, . . . . .	35,425	37,627	100.00	100.00

From this table it appears that corporations containing less than 100 stockholders each, comprised, in 1890, about one-third of the total number of stockholders, the percentage of the total number being 33.06. In 1891 corporations of this class contained 32.18 per cent of the total number of stockholders. A somewhat smaller percentage of the total number, practically the same in each year, being 26.22 in 1890 and 26.25 in 1891, were in corporations containing 100 stockholders but less than 300. On the other hand, corporations containing 300 stockholders and over, which of course indicates a comparatively wide diffusion of stock, comprised 40.68 per cent of the total number of stockholders in 1890 and 41.53 per cent in 1891.

The following presentation shows the effect of the change from private firm to corporation upon partners in the aggregate :

CLASSIFICATION.	NUMBER	
	1890	1891
Private firms, . . . . .	2,987	2,952
Partners, . . . . .	4,909	4,824
Average number of partners to a private firm, .	1.64	1.63
Corporations, . . . . .	730	762
Stockholders, . . . . .	35,425	37,627
Average number of stockholders to a corporation, .	48.53	49.38

The average number of partners to a private firm was practically the same in each year, being 1.64 in 1890 and 1.63 in 1891. The average number of stockholders to a corporation shows a very slight increase, from 48.53 in 1890 to 49.38 in 1891.

The following summary condenses returns relative to private firms, corporations, partners, and stockholders for 1891 :

Out of 3,745 establishments in 75 industries 2,952, or 79.48 per cent, are private firms, and 762, or 20.52 per cent, are corporations. Private firms and corporations are managed by 42,451 persons of whom 4,824, or 11.36 per cent, are partners and 37,627, or 88.64 per cent, are stockholders. Of the partners, 97.28 per cent are males, 2.53 per cent are females, and 0.19 per cent are estates, etc. Of stockholders, on the

other hand, 59.76 per cent are males, 30.51 per cent are females, and 9.73 per cent are banks, trustees, etc. Of the whole number of persons managing the business of the establishments represented, 64.03 per cent are males, 27.33 per cent are females, and 8.64 per cent banks, trustees, etc. The average number of partners to a private firm is 1.63 and the average number of stockholders to a corporation is 49.38.

### CAPITAL INVESTED: BY INDUSTRIES.

The presentation relative to the capital invested in the different industries, and to All Industries in the aggregate, appears on pages 18 to 21. The first table, pages 18 and 19, presents the amount of capital invested in the establishments making returns in 1890 and 1891 with amounts of increase or decrease and percentages. The following industries, 47 in number, show an increase in capital in 1891 as compared with 1890:

Artisans' Tools.  
Awnings, Sails, Tents, etc.  
Boxes (Paper and Wooden).  
Brick, Tiles, and Sewer Pipe.  
Brooms, Brushes, and Mops.  
Burial Cases, Caskets, Coffins, etc.  
Buttons and Dress Trimmings.  
Cement, Kaolin, Lime, and Plaster.  
Chemical Preparations (Compound-  
ed).  
Clocks, Watches, and Jewelry.  
Clothing.  
Cordage and Twine.  
Corks, Bungs, and Taps.  
Cotton Goods.  
Crayons, Pencils, Crucibles, etc.  
Drugs and Medicines.  
Fireworks and Matches.  
Flax, Hemp, Jute, and Linen Goods.  
Food Preparations.  
Glass.  
Hose: Rubber, Linen, etc.  
Hosiery and Knit Goods.  
Ink, Mucilage, and Paste.  
Ivory, Bone, Shell, and Horn Goods,  
etc.  
Liquors and Beverages (Not Spirit-  
uous).

Liquors: Malt, Distilled, and Fer-  
mented.  
Lumber.  
Machines and Machinery.  
Metals and Metallic Goods.  
Mixed Textiles.  
Models and Patterns.  
Musical Instruments and Materials.  
Oils and Illuminating Fluids.  
Paints, Colors, and Crude Chemicals.  
Paper and Paper Goods.  
Perfumes, Toilet Articles, etc.  
Printing, Publishing, and Bookbind-  
ing.  
Railroad Construction and Equip-  
ment.  
Rubber and Elastic Goods.  
Scientific Instruments and Ap-  
pliances.  
Sporting and Athletic Goods.  
Tallow, Candles, Soap, and Grease.  
Tobacco, Snuff, and Cigars.  
Toys and Games (Children's).  
Trunks and Valises.  
Whips, Lashes, and Stocks.  
Wooden Goods.

The following industries, 26 in number, exhibit a decrease in capital invested in 1891 as compared with 1890:

<b>Agricultural Implements.</b>	<b>Furniture.</b>
<b>Arms and Ammunition.</b>	<b>Glue, Isinglass, and Starch.</b>
<b>Boots and Shoes.</b>	<b>Hair Work (Animal and Human).</b>
<b>Carpetings.</b>	<b>Leather.</b>
<b>Carriages and Wagons.</b>	<b>Photographs and Photographic Materials.</b>
<b>Cooking, Lighting, and Heating Apparatus.</b>	<b>Polishes and Dressing.</b>
<b>Dyestuffs.</b>	<b>Print Works, Dye Works, and Bleacheries.</b>
<b>Earthen, Plaster, and Stone Ware.</b>	<b>Shipbuilding.</b>
<b>Electrical Apparatus and Appliances.</b>	<b>Silk and Silk Goods.</b>
<b>Emery and Sand Paper and Cloth, etc.</b>	<b>Stone.</b>
<b>Fancy Articles.</b>	<b>Straw and Palm Leaf Goods.</b>
<b>Fertilizers.</b>	<b>Woollen Goods.</b>
<b>Fine Arts and Taxidermy.</b>	<b>Worsted Goods.</b>

In two industries, namely, Cotton, Woollen, and Other Textiles and Electroplating, no change in capital invested is reported.

In the 3,745 establishments compared an aggregate increase in capitalization appears. This increase is, however, very slight, amounting to \$9,932,490, or 2.34 per cent. The decreases in capital, where they appear, are also very slight, exceeding three per cent in only nine industries, namely: Agricultural Implements; Earthen, Plaster, and Stone Ware; Fine Arts and Taxidermy; Furniture; Leather; Polishes and Dressing; Print Works, Dye Works, and Bleacheries; Silk and Silk Goods; and Straw and Palm Leaf Goods. On the other hand, an increase in capital greater than three per cent appears in Boxes (Paper and Wooden); Brick, Tiles, and Sewer Pipe; Burial Cases, Caskets, Coffins, etc.; Buttons and Dress Trimmings; Cement, Kaolin, Lime, and Plaster; Clocks, Watches, and Jewelry; Cordage and Twine; Corks, Bunks, and Taps; Crayons, Pencils, Crucibles, etc.; Drugs and Medicines; Fireworks and Matches; Flax, Hemp, Jute, and Linen Goods; Food Preparations; Glass; Ivory, Bone, Shell, and Horn Goods, etc.; Liquors and Beverages (Not Spirituous); Liquors: Malt, Distilled, and Fermented; Lumber; Machines and Machinery; Metals and Metallic Goods; Mixed Textiles; Models and Patterns; Musical Instruments and Materials;

Railroad Construction and Equipment; Rubber and Elastic Goods; Scientific Instruments and Appliances; Sporting and Athletic Goods; Tallow, Candles, Soap, and Grease; Tobacco, Snuff, and Cigars. Of these industries, those showing an increase greater than five per cent are the following: Burial Cases, Caskets, Coffins, etc.; Cement, Kaolin, Lime, and Plaster; Corks, Bungs, and Taps; Crayons, Pencils, Crucibles, etc.; Drugs and Medicines; Fireworks and Matches; Flax, Hemp, Jute, and Linen Goods; Food Preparations; Glass; Ivory, Bone, Shell, and Horn Goods, etc.; Liquors and Beverages (Not Spirituous); Lumber; Machines and Machinery; Metals and Metallic Goods; Models and Patterns; Musical Instruments and Materials; Rubber and Elastic Goods; Scientific Instruments and Appliances; Sporting and Athletic Goods; and Tobacco, Snuff, and Cigars.

For the purpose of bringing the changes in capital invested in the more important industries directly before the reader, the following condensation is useful. The industries specified by name in this presentation are the principal industries of the State.

INDUSTRIES.	Number of Estab- lishments Con- sidered	AMOUNT OF CAPITAL INVESTED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Boots and shoes, . . . .	567	\$27,790,899	\$27,507,315	—\$283,584	—1.02
Carpetings, . . . . .	12	7,905,635	7,687,708	—217,927	—2.76
Cotton goods, . . . . .	157	114,947,374	117,933,102	+2,985,728	+2.60
Leather, . . . . .	154	9,039,011	8,212,735	—826,276	—9.14
Machines and machinery, . .	263	24,537,451	26,627,625	+2,090,174	+8.52
Metals and metallic goods, .	277	23,617,954	25,805,602	+2,187,648	+9.26
Musical instruments and materials,	46	4,440,484	4,683,783	+243,299	+5.48
Paper and paper goods, . . .	102	22,120,916	22,556,155	+435,239	+1.97
Woollen goods, . . . . .	138	28,271,436	27,835,204	—436,232	—1.54
Worsted goods, . . . . .	21	10,912,129	10,782,298	—129,831	—1.19
Other industries, . . . . .	2,008	151,140,523	155,024,775	+3,884,252	+2.57
ALL INDUSTRIES, . . . .	3,745	\$424,723,812	\$434,656,302	+\$9,932,490	+2.34

Of the ten industries mentioned in detail in the above table, Cotton Goods, Machines and Machinery, Metals and Metallic Goods, Musical Instruments and Materials, and Paper and Paper Goods show increases in capital invested in 1891 as com-



pared with 1890. The increase in Cotton Goods is but slightly greater than the average for All Industries, being 2.60 per cent. In Machines and Machinery and Metals and Metallic Goods the increases are 8.52 per cent and 9.26 per cent, respectively. Musical Instruments and Materials shows an increase of 5.48 per cent. In Paper and Paper Goods only a slight increase appears, namely, 1.97 per cent, while a decrease in capital appears in Boots and Shoes, Carpetings, Leather, Woollen Goods, and Worsted Goods. The decrease is very slight except in Leather, where it amounts to 9.14 per cent. In the other industries mentioned the decrease does not exceed three per cent and does not amount to two per cent except in Carpetings, where a decrease of 2.76 per cent appears. The capital invested in the ten selected industries mentioned in this table constitutes 64.41 per cent of the total capital returned in 1890 and 64.33 per cent of the total capital returned in 1891.

In the second statistical presentation relating to capital invested, pages 20 and 21, a comparison appears of capital invested in the same establishments in the different industries considered for the years 1885 and 1890. This is a period of five years, the first being the year of the Decennial Census. The industries represented in this table are the same as those shown in the table just considered. The number of establishments making returns in both 1885 and 1890 and, therefore, entering into the comparison, is 3,817 for All Industries instead of 3,745, the number for which comparison was made for the years 1890 and 1891. The following industries show a decrease in 1890 as compared with 1885: Agricultural Implements; Artisans' Tools; Brick, Tiles, and Sewer Pipe; Buttons and Dress Trimmings; Chemical Preparations (Compounded); Cooking, Lighting, and Heating Apparatus; Corks, Bungs, and Taps; Cotton Goods; Cotton, Woollen, and Other Textiles; Crayons, Pencils, Crucibles, etc.; Electroplating; Emery and Sand Paper and Cloth, etc.; Fertilizers; Fireworks and Matches; Flax, Hemp, Jute, and Linen Goods; Ivory, Bone, Shell, and Horn Goods, etc.; Mixed Textiles; Oils and Illuminating Fluids; Straw and Palm Leaf Goods; Trunks and Valises; and Whips, Lashes, and Stocks. The decreases in capital invested are either very slight or else are based upon a comparatively small amount of capital, these

industries, except Cotton Goods, being among the minor industries of the State. In Cotton Goods, the decrease in capital invested in 1890 as compared with 1885 is based upon the returns of 142 leading establishments and amounts to 6.17 per cent.

In the report on the Statistics of Manufactures for 1890 a comparison was made of the amount of capital invested in this industry in 1887, 1888, 1889, and 1890 as compared with 1886, for 109 establishments. From this comparison it appeared that an increase in capitalization took place in 1887 as compared with 1886 to the extent of 11.17 per cent in the aggregate. In each of the succeeding years a decline was noted, except in 1890, when an increase of 6.84 per cent occurred over the previous year, carrying the aggregate capital invested in the 109 typical establishments represented to \$98,221,151, as against \$87,717,006 in 1886, a net increase of 11.98 per cent.

The comparison between 1885 and 1890, just presented, indicates a net decrease in 1890 as compared with 1885; but, as we have just shown, the previous Report indicated an increase of capital invested in the industry in 1890 as compared with 1886. It is probable, therefore, that the year 1886 was a year of comparatively low capitalization in this industry.

In the following table the ten principal industries are compared for the years 1885 and 1890, data being brought forward from the presentation on pages 20 and 21 :

INDUSTRIES.	Number of Establishments Considered	AMOUNT OF CAPITAL INVESTED		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percentages
Boots and shoes, . . . . .	528	\$23,293,493	\$23,448,028	+ \$5,154,535	+22.13
Carpets, . . . . .	11	7,231,443	7,854,349	+622,906	+8.61
Cotton goods, . . . . .	142	116,355,276	109,173,772	-7,181,504	-6.17
Leather, . . . . .	169	8,925,338	9,790,034	+864,696	+9.69
Machines and machinery, . . . . .	255	17,437,283	23,514,454	+6,077,171	+34.85
Metals and metallic goods, . . . . .	268	19,070,549	22,025,517	+3,554,968	+18.64
Musical instruments and materials, . . . . .	45	4,005,059	5,594,787	+1,589,728	+39.69
Paper and paper goods, . . . . .	95	19,413,557	20,254,869	+841,012	+4.33
Woollen goods, . . . . .	128	25,940,132	28,056,310	+2,116,158	+8.16
Worsted goods, . . . . .	16	7,182,856	8,022,091	+1,439,235	+20.04
Other industries, . . . . .	2,162	128,709,956	157,656,042	+28,946,086	+22.49
ALL INDUSTRIES, . . . . .	3,817	\$377,564,962	\$421,589,953	+\$44,024,991	+11.66

The capital invested in the ten selected industries entering into the above comparison represented 62.60 per cent of the capital invested in the 3,817 establishments considered in 1890. In the Decennial Census of 1885 these ten industries contained 59.64 per cent of the total amount of capital invested in the manufacturing and mechanical industries of the State. All of these industries show an increase in capitalization except the cotton goods industry to which we have alluded. In Carpetings, Leather, Paper and Paper Goods, and Woollen Goods the increase in capital invested amounts to less than ten per cent, the percentages being 8.61, 9.69, 4.33, and 8.16, respectively. The increase in capitalization in Metals and Metallic Goods is 18.64 per cent. In Boots and Shoes and Worsted Goods the respective percentages of increase are 22.13 and 20.04. In Machines and Machinery and Musical Instruments and Materials increases of 34.85 per cent and 39.69 per cent, respectively, appear. In all other industries, except the ten principal ones presented in detail, the aggregate increase for the five years was 22.49 per cent.

Returns respecting capital invested are probably more liable to be misleading than any other element entering into the statistical presentations in these reports, if it is not continually borne in mind that the term capital, as used in the returns, does not mean merely cash capital or capital stock, but, on the other hand, includes all forms of capital devoted to production. That is to say, it includes, besides cash and its equivalents (notes or bills receivable), land, machinery, and stock on hand or in process of manufacture. Some of these elements are variable from year to year and this undoubtedly accounts for the apparently wide fluctuations in the amount of capital invested which sometimes appear in the returns. It is necessary to repeat the caution inserted in previous Reports, that "Increase in capital shown in the tables simply means that more capital was devoted to production. It does not necessarily imply an investment of more money on the part of partners or stockholders. It may mean an expansion of credit. The converse of each of these statements is, of course, equally true." And we may also repeat, from the Report of last year, that an expansion of credit is not to be considered

evidence of industrial distress. The use of loaned capital for the purchase of stock at different periods of the market may be, and frequently is, a wise business transaction. The value of stock purchased on credit is, of course, represented in the capital invested. Capital invested in any given industry, for instance, Cotton Goods, may be partly invested in materials purchased in a favorable market and held at the time of making the return. This would show a larger proportionate capital invested than would appear at another time when the stock of raw cotton was comparatively low. But under the last named conditions the comparatively smaller amount of capital invested in the industry, which would appear in the returns, would not, it is plain, indicate a decrease in prosperity in the industry. These qualifying conditions, all of which affect returns relative to capital, should be borne in mind before deductions are drawn respecting the different industries represented, based upon the amount of capital appearing in the returns.

#### STOCK USED: BY INDUSTRIES.

The statistical tables on pages 24 to 41 relate to stock used in the different industries. The first presentation, pages 24 and 25, shows a comparison for the years 1890 and 1891. In the 3,745 establishments in All Industries the total value of stock used, in 1890, was \$352,435,774 and in 1891, \$362,210,369, an increase of only 2.77 per cent. It will be understood, of course, that the term "stock used" includes all kinds of materials consumed in the establishments, whether so-called raw material or material which has been subjected to previous processes and is itself a manufactured product of some other establishment or industry. It includes not only material entering into the fabric of the articles produced by the establishments from which the returns are secured, but also all other materials such as coal, oil, etc., consumed in the processes necessary to the production of the goods made by these establishments. It would be interesting, had the condition of the returns permitted, to separate that portion of stock used which is strictly raw material from the other articles of stock consumed. Unfortunately, the returns have never yet been made in sufficient detail to permit this to be done. Much improvement, however, has

been made in this direction, and it will undoubtedly be possible in our next report to present such a classification as will permit this separation to be made.

It is not necessary in this analysis to refer in detail to all the industries represented in the table. We select for this purpose, in the following presentation, the ten principal industries :

INDUSTRIES	Number of Estab- lishments Con- sidered	VALUE OF STOCK USED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Boots and shoes, . . . .	567	\$54,441,633	\$52,619,900	-\$1,821,643	-3.35
Carpetings, . . . . .	12	4,831,720	5,122,453	+290,733	+6.02
Cotton goods, . . . . .	157	52,290,280	52,253,505	-36,755	-0.07
Leather, . . . . .	154	13,959,611	11,925,222	-2,034,389	-14.57
Machines and machinery, . .	263	9,309,620	8,870,851	-438,769	-4.71
Metals and metallic goods, . .	277	17,924,860	17,651,163	-275,707	-1.54
Musical instruments and materials,	46	2,115,603	2,018,603	-97,000	-4.58
Paper and paper goods, . . .	102	14,609,690	15,680,804	+1,071,114	+7.33
Woollen goods, . . . . .	138	19,461,068	21,162,373	+1,701,305	+8.74
Worsted goods, . . . . .	21	10,448,643	12,220,984	+1,772,341	+16.96
Other industries, . . . . .	2,008	153,041,066	162,684,431	+9,643,365	+6.30
ALL INDUSTRIES, . . . .	3,745	\$352,435,774	\$362,210,369	+\$9,774,595	+2.77

Of the industries presented in detail in the above table, Carpetings shows an increase in the value of stock used in 1891 as compared with 1890 of 6.02 per cent; Paper and Paper Goods an increase of 7.33 per cent; Woollen Goods an increase of 8.74 per cent; and Worsted Goods an increase of 16.96 per cent; the increase in all of these industries being considerably above the average for All Industries, which was 2.77 per cent. On the other hand, Boots and Shoes shows a decrease in the value of stock used of 3.35 per cent; Leather a decrease of 14.57 per cent; Machines and Machinery a decrease of 4.71 per cent; Metals and Metallic Goods a decrease of 1.54 per cent; Musical Instruments and Materials a decrease of 4.58 per cent; and Cotton Goods the slight decrease of 0.07 per cent. All other industries except the ten principal ones just specified show an aggregate increase in the value of stock used of 6.30 per cent.

Turning to the tabular presentations contained in the report we find, on pages 26 and 27, a comparison of the value of stock used in the same establishments for the years 1885 and 1890. These are the same years which were used in the comparison previously made as to capital invested, the first being the year of the Decennial Census. The relative increase or decrease in 1890 as compared with 1885 is given with equivalent percentages, for 3,817 identical establishments. We bring forward and condense in the following detailed presentation data for the ten principal industries :

INDUSTRIES.	Number of Establishments Considered	VALUE OF STOCK USED		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percentages
Boots and shoes, . . . .	528	\$47,583,750	\$53,798,109	+\$6,214,359	+13.06
Carpetings, . . . .	11	3,721,895	4,668,076	+946,181	+25.42
Cotton goods, . . . .	142	36,607,021	49,673,961	+13,066,940	+35.70
Leather, . . . .	169	14,951,966	15,137,926	+185,960	+1.24
Machines and machinery, . .	255	5,106,068	8,985,297	+3,879,229	+75.97
Metals and metallic goods, . .	268	11,810,800	17,229,077	+5,418,477	+45.88
Musical instruments and materials,	45	1,789,242	2,698,961	+909,719	+50.84
Paper and paper goods, . . .	95	11,857,538	13,471,429	+1,613,891	+13.61
Woollen goods, . . . .	126	16,012,384	19,157,999	+3,145,615	+19.64
Worsted goods, . . . .	16	5,507,333	7,828,273	+2,320,940	+42.14
Other industries, . . . .	2,162	123,882,450	158,500,435	+34,617,985	+27.94
ALL INDUSTRIES, . . . .	3,817	\$278,830,247	\$351,149,543	+\$72,319,296	+25.94

In all of these industries an increase in the value of stock used is shown. The increase is least in Leather, amounting to only 1.24 per cent. Next to this industry stands Boots and Shoes with an increase of 13.06 per cent. In Paper and Paper Goods an increase of 13.61 per cent is shown, and next higher in the scale is Woollen Goods with an increase of 19.64 per cent. In Carpetings we find an increase of 25.42 per cent; in Cotton Goods an increase of 35.70 per cent; while in Machines and Machinery we find that the value of stock used in 255 typical establishments was, in 1885, \$5,106,068 and the same establishments consumed, in 1890, stock and materials amounting to \$8,985,297, an increase of 75.97 per cent. This is the largest increase shown in any of the leading industries, and

it is only approached by the increase shown in Musical Instruments and Materials. In this industry 45 establishments are represented, the percentage of increase being 50.84. In Metals and Metallic Goods and in Worsted Goods the percentages of increase are 45.88 and 42.14, respectively. In all other industries except the ten presented in detail the aggregate increase is 27.94 per cent, slightly higher than the increase for All Industries, which is 25.94 per cent.

An interesting presentation on pages 28 to 41 concludes the statistics relating to stock used. This presentation consists of a comparison of quantities and values for the years 1890 and 1891. It affords an opportunity for noting changes in the average cost of a considerable number of leading articles of stock consumed; and, as these articles of stock are in many cases products of other industries, the value of the comparison is enhanced. The method of reading the table is clearly explained in the head-note which need not be repeated here. The table will repay careful study. The value of such a presentation as a record of prices from year to year is unquestioned.

#### GOODS MADE: BY INDUSTRIES AND TOWNS.

The statistical presentation, pages 45 and 46, presents a comparison of the value of goods made in the different establishments for the years 1890 and 1891, with the increase or decrease in amounts and percentages. The total value of goods made in the 3,745 establishments was, in 1890, \$605,032,664 and in 1891, \$613,100,717. This is an increase of \$8,068,053, or 1.33 per cent. The very slight percentage of increase for All Industries indicates that, so far as total product was concerned, the industrial conditions were practically the same in each year. Some of the industries, however, as will appear from an inspection of the table, increased their output to an extent very much greater than the increase for all industries.

It is not necessary to refer here to the different industries in detail. We bring forward a condensed table for the ten leading industries which were previously shown in detail for capital invested and stock used, in order that a similar comparison for goods made may be brought directly before the reader.

INDUSTRIES.	Number of Estab- lishments Con- sidered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Boots and shoes, . . . .	567	\$90,550,454	\$89,229,603	-\$1,320,851	-1.46
Carpetings, . . . .	12	7,731,055	8,967,614	+1,236,559	+15.99
Cotton goods, . . . .	157	90,063,203	89,867,630	-205,573	-0.23
Leather, . . . .	154	20,122,480	17,090,803	-3,031,677	-15.07
Machines and machinery, . .	263	25,212,841	24,876,466	-336,375	-1.33
Metals and metallic goods, . .	277	34,124,906	34,198,526	+73,620	+0.22
Musical instruments and materials,	46	5,590,946	5,336,790	-254,156	-4.55
Paper and paper goods, . . . .	102	25,219,222	25,803,660	+584,438	+2.32
Woollen goods, . . . .	138	31,151,139	33,989,359	+2,838,220	+9.11
Worsted goods, . . . .	21	15,350,196	17,219,318	+1,869,122	+12.18
Other industries, . . . .	2,008	259,916,222	266,530,948	+6,614,726	+2.54
ALL INDUSTRIES, . . . .	3,745	\$605,032,664	\$613,100,717	+\$8,068,053	+1.33

The final line in the above table reproduces the figures just cited for All Industries. An inspection of the details of the table at once shows that Boots and Shoes, Cotton Goods, Leather, Machines and Machinery, and Musical Instruments and Materials exhibit a decline in value of product in 1891 as compared with 1890. The percentages of decrease, however, are quite small except in the case of Leather, which shows a decline of 15.07 per cent. In Carpetings an increase in value of product appears of 15.99 per cent. In Metals and Metallic Goods the increase is unimportant, amounting to only 0.22 per cent. In Paper and Paper Goods we find an increase of 2.32 per cent; and in Woollen Goods and Worsted Goods the percentages of increase are 9.11 and 12.18, respectively. Excluding these ten principal industries, the percentage of increase in all other industries in the aggregate is found to be 2.54, but slightly greater than the percentage of increase for All Industries.

In the report on the Statistics of Manufactures for last year a table was presented showing a comparison of the value of goods made and work done for the ten principal industries for the years 1885 and 1890, based upon returns from 3,696 establishments. The increased number of returns received during the present year enables a similar comparison to be made for 3,817 identical establishments. This comparison is presented in the following table:



INDUSTRIES.	Number of Establishments Considered	VALUE OF GOODS MADE AND WORK DONE		INCREASE (+), OR DECREASE (-), IN 1890	
		1885	1890	Amounts	Percentages
Boots and shoes, . . . . .	528	\$75,420,266	\$89,245,667	+\$13,825,401	+18.33
Carpetings, . . . . .	11	5,991,919	7,494,940	+1,503,021	+25.08
Cotton goods, . . . . .	142	62,107,118	85,757,983	+23,650,815	+38.08
Leather, . . . . .	169	20,706,151	21,787,286	+1,079,135	+5.21
Machines and machinery, . . . . .	255	14,727,678	24,715,319	+9,987,641	+67.82
Metals and metallic goods, . . . . .	268	23,287,738	33,009,798	+9,722,060	+41.75
Musical instruments and materials, . . . . .	45	4,834,461	6,784,910	+1,950,449	+40.34
Paper and paper goods, . . . . .	95	18,795,947	23,028,995	+4,233,048	+22.52
Woollen goods, . . . . .	126	26,859,083	30,915,808	+4,056,725	+15.10
Worsted goods, . . . . .	16	7,802,735	11,469,957	+3,667,222	+47.00
Other industries, . . . . .	2,162	200,299,580	268,821,655	+68,522,095	+34.21
<b>ALL INDUSTRIES, . . . . .</b>	<b>3,817</b>	<b>\$460,634,656</b>	<b>\$603,032,268</b>	<b>+\$142,197,612</b>	<b>+30.86</b>

The results of the above comparisons substantiate those of the table presented last year. The increase in the value of product in the 3,817 establishments amounts in the aggregate to \$142,197,612, or 30.86 per cent. All of the leading industries show an increase in 1890 as compared with the Census Year 1885, the increase in every instance being considerable except in the leather industry where the percentage of increase is but 5.21. In Boots and Shoes and Woollen Goods the percentages of increase are 18.33 and 15.10, respectively. We find in Carpetings and Paper and Paper Goods increases of 25.08 per cent and 22.52 per cent, respectively, while in Cotton Goods an increase of 38.08 per cent appears. In Machines and Machinery and Metals and Metallic Goods the percentages of increase are 67.82 and 41.75, respectively. In Musical Instruments and Materials an increase of 40.34 per cent and in Worsted Goods an increase of 47 per cent appears. In all other industries except the ten specified in detail the percentage of aggregate increase is 34.21.

The statistical table beginning on page 47 presents a comparison for goods made, based upon returns from identical establishments for the years 1887 to 1891 so arranged that comparison may be made between any two of the years for which figures are given. The total number of establishments each of which made return in each of these years is 1,130.

The results in the aggregate are brought forward in the following table :

YEARS.	Number of Establishments Considered	Value of Goods Made and Work Done	INCREASE (+), OR DECREASE (-), AS COMPARED WITH PREVIOUS YEAR	
			Amounts	Percentages
1887, . . . . .	1,130	\$311,787,327	-	-
1888, . . . . .	1,130	321,664,584	+\$9,877,257	+3.17
1889, . . . . .	1,130	333,438,652	+11,774,068	+3.66
1890, . . . . .	1,130	345,395,127	+11,956,475	+3.59
1891, . . . . .	1,130	349,201,525	+3,806,398	+1.10

The percentages of increase in 1888 as compared with 1887, in 1889 as compared with 1888, and in 1890 as compared with 1889 are very similar, being 3.17, 3.66, and 3.59, respectively ; but the increase in 1891 as compared with 1890 was but 1.10 per cent, a ratio of less than half that shown in each of the three previous years.

If we turn to the table on page 47 we find that in Boots and Shoes increased output appears in 1888, 1889, and 1890 as compared with the year next preceding ; but in 1891 a decline in value of product appears as compared with 1890. Similar conditions are shown for Cotton Goods on page 48. In the leather industry, presented on page 49, a yearly decrease appears, except in the year 1890, in which an increase in value of product amounting to 9.46 per cent was shown over that returned in 1889. In Machines and Machinery, on page 50, conditions similar to those in Boots and Shoes and Cotton Goods appear. A yearly increase in product is found, except in 1891 as compared with 1890. In Metals and Metallic Goods, on the other hand, the value of product declined in 1888 as compared with 1887, while an increase appears for each subsequent year. In Woollen Goods, presented on page 51, the value of product declined in 1888 as compared with 1887 to the extent of 2.89 per cent, increasing in 1889 as compared with 1888 to 2.44 per cent, declining again in 1890 as compared with 1889, the decline amounting to 1.40 per cent, and increasing in 1891 as compared with 1890 to the extent of 9.41 per cent. In Worsteds Goods a fair percentage of increase is

shown in each year subsequent to 1887 as compared with the value of product of the previous year, the percentage of increase in 1891 as compared with 1890 being 7.20; in 1890 as compared with 1889, 2.38; in 1889 as compared with 1888, 9.03; in 1888 as compared with 1887, 3.29. The paper and paper goods industry, shown on page 50, presents similar conditions, an increase appearing in the value of product year by year. The only other industries which present continuous yearly increases since 1887 are Boxes (Paper and Wooden), presented on page 47, Clocks, Watches, and Jewelry, presented on page 48, and Glass, presented on page 49.

In the following analysis table the returns from 1,130 establishments, for 1888 and each subsequent year, are compared with each previous year beginning with 1887:

CLASSIFICATION.	INCREASE (+), OR DECREASE (-), IN THE VALUE OF GOODS MADE AND WORK DONE	
	Amounts	Percentages
1888 as compared with 1887, . . . .	+9,877,257	+3.17
1889 as compared with 1887, . . . .	+21,651,325	+6.94
1890 as compared with 1887, . . . .	+33,607,800	+10.78
1891 as compared with 1887, . . . .	+37,414,198	+12.00
1889 as compared with 1888, . . . .	+11,774,068	+3.66
1890 as compared with 1888, . . . .	+23,730,543	+7.38
1891 as compared with 1888, . . . .	+27,536,941	+8.56
1890 as compared with 1889, . . . .	+11,956,475	+3.59
1891 as compared with 1889, . . . .	+15,762,873	+4.73
1891 as compared with 1890, . . . .	+3,806,398	+1.10

In 1891 as compared with 1887 an increase of 12 per cent appears, or an average of three per cent for each year. In 1891 as compared with 1890 the increase was but 1.10 per cent, or considerably below the yearly average shown since 1887. In 1891 as compared with 1888 the percentage of increase was 8.56 and as compared with 1889, 4.73. So that the result of this comparison justifies the statement that, while the output in 1891 is below the average for the five preceding years, yet when compared with any other year subsequent to 1887 this output is found to be above the average.

From the following graphic presentation derived from the returns of 1,130 establishments, each of which made returns

for 1887 and for each subsequent year, the fact of increase or decrease in value of product in each of the years subsequent to 1887 as compared with the value of product returned in that year may be easily seen, the sign (+) indicating a gain and the sign (—) indicating a decrease.

INDUSTRIES.	1888 as com- pared with 1887	1889 as com- pared with 1887	1890 as com- pared with 1887	1891 as com- pared with 1887
Agricultural implements, . . . . .	+	+	+	—
Arms and ammunition, . . . . .	—	—	—	+
Artisans' tools, . . . . .	+	—	+	+
Boots and shoes, . . . . .	+	+	+	+
Boxes (paper and wooden), . . . . .	+	+	+	+
Buttons and dress trimmings, . . . . .	+	—	—	—
Carpetings, . . . . .	—	+	+	+
Carriages and wagons, . . . . .	+	+	+	+
Clocks, watches, and jewelry, . . . . .	+	+	+	+
Clothing, . . . . .	+	—	+	+
Cordage and twine, . . . . .	+	+	+	+
Cotton goods, . . . . .	+	+	+	+
Flax, hemp, jute, and linen goods, . . . . .	+	+	+	+
Food preparations, . . . . .	+	+	+	+
Furniture, . . . . .	—	—	+	+
Glass, . . . . .	+	+	+	+
Hosiery and knit goods, . . . . .	—	—	—	—
Leather, . . . . .	—	—	—	—
Liquors: malt, distilled, and fermented, . . . . .	+	+	+	+
Machines and machinery, . . . . .	+	+	+	+
Metals and metallic goods, . . . . .	—	+	+	+
Mixed textiles, . . . . .	+	+	+	—
Musical instruments and materials, . . . . .	+	+	+	+
Paper and paper goods, . . . . .	+	+	+	+
Print works, dye works, and bleacheries, . . . . .	—	—	+	—
Rubber and elastic goods, . . . . .	+	+	+	+
Shipbuilding, . . . . .	+	+	+	+
Silk and silk goods, . . . . .	—	+	+	+
Stone, . . . . .	—	—	—	—
Straw and palm leaf goods, . . . . .	—	—	—	+
Tallow, candles, soap, and grease, . . . . .	+	+	+	+
Wooden goods, . . . . .	—	—	—	+
Woollen goods, . . . . .	—	—	—	+
Worsted goods, . . . . .	+	+	+	+
TOTALS, . . . . .	+	+	+	+

Noting the plus signs in the preceding table it is at once evident that the following industries show a gain in the value of product in each subsequent year as compared with 1887: Boots and Shoes; Boxes (Paper and Wooden); Carriages and Wagons; Clocks, Watches, and Jewelry; Cordage and Twine; Cotton Goods; Flax, Hemp, Jute, and Linen Goods; Food Preparations; Glass; Liquors: Malt, Distilled, and Fermented; Machines and Machinery; Musical Instruments and Materials; Paper and Paper Goods; Rubber and Elastic Goods; Shipbuilding; Tallow, Candles, Soap, and Grease; and Worsted Goods. The same statement is true of All Industries in the aggregate. On the other hand, the following industries show a decline in the value of product in each year as compared with 1887: Hosiery and Knit Goods; Leather; and Stone. In Agricultural Implements and Mixed Textiles an increase in product appears in each subsequent year as compared with 1887 until the year 1891 is reached, when a smaller product appears than was returned in the year first named. An exactly opposite condition appears in Arms and Ammunition, Wooden Goods and Woollen Goods, which exhibit a decline in output in each subsequent year as compared with 1887 until the year 1891, when an increase in product is found as compared with the year first named. A few minor industries exhibit fluctuations which need not be particularly pointed out but which can be discerned from the table.

#### GOODS MADE: BY TOWNS.

We have this year introduced a tabulation showing the value of goods made and work done in certain selected industries by counties, cities, and towns for 1885 and 1890, thus permitting direct comparison between the two years, the first being the date of the Decennial Census. This tabulation begins on page 55. It must be remembered that the number of establishments given does not in any instance represent the total number of establishments in any city, town, or industry. It includes those only which reported the value of goods made and work done in both of the years taken for comparison, namely, 1885 and 1890, thus permitting direct comparison as to the output in the same establishments during those years. The relative increase or decrease in 1890 as compared with 1885 is given,

with its equivalent percentage. In order not to disclose the business of any individual manufacturer certain establishments are omitted from the detailed town presentation, being included, however, in the line "Other cities and towns" and in the State recapitulations.

This tabulation permits a comparison of the output in 1885 and 1890, in the leading establishments in the principal industrial towns, for the particular industries for which each town is noted. For instance, referring to the presentation relating to Boots and Shoes, on page 55, we find that 96 leading establishments including the large concerns in Haverhill made returns in each of the years, the value of goods made and work done in them being \$6,635,456 in 1885, and \$9,275,055 in 1890, an increase of \$2,639,599, or 39.78 per cent. In Plymouth County, on page 56, we find Brockton, another leading boot and shoe centre, represented by 39 establishments in each year, the increase in the value of goods made and work done in 1890 as compared with 1885 being \$4,423,489, or 56.47 per cent. Similar comparisons may be made for other shoe towns. Turning to the cotton goods industry, on page 57, we find 33 leading establishments in Fall River represented at each period in the comparison, the increase in output being \$7,811,379, or 52.14 per cent. In New Bedford, in the same county, taking the five leading concerns, the increase is \$2,545,253, or 58.23 per cent. In Lowell, to take another cotton centre, eight establishments return an increase of \$5,865,157 in 1890 as compared with 1885, or 45.89 per cent. The presentation for the leather industry is contained on page 59. In Peabody 28 establishments enter into the comparison, the increase in output being 19.94 per cent. On the other hand, in Woburn 17 establishments are compared, and a decrease in output of 10.36 per cent is shown in 1890 as compared with 1885. It is not necessary to carry the analysis further, the citations showing the method of using the table. In each industry the percentages of increase or decrease shown for the leading establishments in various towns may be compared with the percentages of increase or decrease for the industry in the State and in the different counties.

The tabulation beginning on page 63 permits a comparison of value of product for all the establishments in the selected cities and towns which made returns in both 1885 and 1890, with a recapitulation for the State and counties. It may be used in the same manner as the table showing the industries in detail by towns, and the same explanation as to the omission of the establishments which did not make returns in each of the years, and the omission of other establishments in order to prevent the disclosure of the business of individual manufacturers, which was made with reference to the table just analyzed, applies to this presentation also. The percentages of increase or decrease, while not based upon aggregates like those of a census, nevertheless afford an indication of the condition of industrial business in 1890 as compared with 1885 in each of the towns, since they are based upon identical establishments covering the leading industries and the leading establishments in each town. In some cases a decrease is noted in the percentage column and in others an increase. These percentages of increase or decrease, while they may be accepted as indicating the condition of affairs for the years selected, might not hold true for other years; and the value of the annual reports lies in the fact that frequent comparisons of this sort may be made, instead of basing all such comparisons upon the results of censuses taken at infrequent periods.

#### PERSONS EMPLOYED: BY INDUSTRIES.

Statistics relating to persons employed are contained on pages 90 to 129. The first table, pages 90 to 93, presents aggregates for persons employed at periods of employment of smallest number and of greatest number; also the aggregate average number of persons employed for the year, with the excess of greatest over smallest number, for the years 1890 and 1891. For All Industries in 1890 in the 3,745 establishments making returns in each year, the aggregate average number of persons employed was 287,900; the number employed at the periods of employment of smallest number being 251,107 and at periods of employment of greatest number 322,288. The excess of greatest over smallest number for the year was 71,181. In 1891 the aggregate average number of persons employed in

these same establishments was 292,866; the number employed at periods of employment of smallest number, 258,771, and at periods of employment of greatest number 329,634, an excess of greatest over smallest number of 70,863.

In the following analysis table, data as to the average number of persons employed during each year are brought forward for the ten leading industries:

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE NUMBER OF PERSONS EMPLOYED DURING THE YEAR		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Number	Per- centages
Boots and shoes, . . . . .	567	44,068	43,343	-725	-1.65
Carpetings, . . . . .	12	4,635	4,672	+37	+0.80
Cotton goods, . . . . .	157	70,596	71,960	+1,364	+1.93
Leather, . . . . .	154	6,137	5,512	-625	-10.18
Machines and machinery, . . . . .	263	15,709	16,120	+411	+2.62
Metals and metallic goods, . . . . .	277	17,096	17,373	+277	+1.62
Musical instruments and materials, . . . . .	46	2,889	2,692	-197	-6.82
Paper and paper goods, . . . . .	102	9,574	9,873	+299	+3.12
Woollen goods, . . . . .	138	16,816	17,479	+663	+3.94
Worsted goods, . . . . .	21	7,963	7,965	+2	+0.03
Other industries, . . . . .	2,008	92,417	95,877	+3,460	+3.74
ALL INDUSTRIES, . . . . .	3,745	287,900	292,866	+4,966	+1.72

The above table indicates that in All Industries there was an increase in the average number of persons employed in 1891 as compared with 1890 amounting to 4,966, or 1.72 per cent. This percentage of increase is exceeded in the following industries each of which shows the percentage of increase annexed: Cotton Goods 1.93 per cent; Machines and Machinery 2.62 per cent; Paper and Paper Goods 3.12 per cent; and Woollen Goods 3.94 per cent. Carpetings, Metals and Metallic Goods, and Worsted Goods also show increases in the average number of persons employed, the percentages, however, being less than the percentage of increase for All Industries, or 0.80, 1.62, and 0.03, respectively. In Boots and Shoes a decrease in the average number of persons employed in 1891 as compared with 1890 appears; also in Leather, and in Musical Instruments and Materials, the percentages of decrease in these three industries being 1.65, 10.18, and 6.82, respectively.



It is impossible to show the amount of employment furnished in the different industries by considering the average number of persons employed without taking into account the periods of unemployment. In the statistical table to which we have just referred, pages 90 to 93, the number of persons employed at periods of employment of smallest and of greatest number, are shown in such manner as to be compared with the aggregate average number of persons employed. In the following table a comparison of persons employed at periods of employment of smallest number is brought forward for the ten selected industries :

INDUSTRIES.	Number of Estab- lishments Con- sidered	SMALLEST NUMBER OF PERSONS EMPLOYED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Number	Per- centages
Boots and shoes, . . . . .	567	35,314	36,201	+887	+2.51
Carpetings, . . . . .	12	4,426	4,345	-81	-1.83
Cotton goods, . . . . .	157	67,862	69,189	+1,327	+1.96
Leather, . . . . .	154	4,493	4,401	-92	-2.05
Machines and machinery, . . . . .	263	13,833	14,101	+268	+1.94
Metals and metallic goods, . . . . .	277	15,268	15,461	+193	+1.26
Musical instruments and materials, . . . . .	46	2,674	2,544	-130	-4.86
Paper and paper goods, . . . . .	102	8,958	9,313	+355	+3.96
Woollen goods, . . . . .	138	15,054	16,007	+953	+6.33
Worsted goods, . . . . .	21	7,345	7,379	+34	+0.46
Other industries, . . . . .	2,008	75,880	79,830	+3,950	+5.21
ALL INDUSTRIES, . . . . .	3,745	251,107	258,771	+7,664	+3.05

The number of persons employed in All Industries at the periods of employment of smallest number aggregates 251,107 in 1890 and 258,771 in 1891, an increase of 3.05 per cent. Three of the industries employed a smaller number of persons in 1891 than in 1890 at periods of employment of smallest number. These industries are Carpetings, Leather, and Musical Instruments and Materials, the percentages of decrease being 1.83, 2.05, and 4.86, respectively. In Boots and Shoes 2.51 per cent more persons were employed in 1891 than in 1890 at the time when the smallest number of persons was employed; in Cotton Goods, 1.96 per cent more; in Machines and Machinery, 1.94 per cent more; in Metals and Metallic

Goods, 1.26 per cent more. In Paper and Paper Goods a gain of 3.96 per cent is seen and in Woollen Goods and Worsted Goods appear gains of 6.33 per cent and 0.46 per cent, respectively.

The following table presents a similar comparison as to the number of persons employed at the periods of employment of greatest number :

INDUSTRIES.	Number of Estab- lishments Con- sidered	GREATEST NUMBER OF PERSONS EMPLOYED		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Number	Per- centages
Boots and shoes, . . . . .	567	51,234	51,550	+316	+0.62
Carpetings, . . . . .	12	4,790	4,865	+85	+1.78
Cotton goods, . . . . .	157	73,323	75,003	+1,680	+2.29
Leather, . . . . .	154	7,421	6,763	-658	-8.80
Machines and machinery, . . . . .	263	17,743	18,033	+290	+1.63
Metals and metallic goods, . . . . .	277	18,718	19,398	+680	+3.63
Musical instruments and materials, . . . . .	46	3,096	2,898	-198	-6.40
Paper and paper goods, . . . . .	102	10,162	10,523	+366	+3.60
Woollen goods, . . . . .	138	18,426	18,821	+395	+2.14
Worsted goods, . . . . .	21	8,787	8,460	-327	-3.72
Other industries, . . . . .	2,006	108,506	113,310	+4,712	+4.34
ALL INDUSTRIES, . . . . .	3,745	322,288	329,634	+7,346	+2.28

In All Industries we find 322,288 persons employed at the periods of employment of greatest number in 1890 and 329,634 in 1891, an increase in the number of persons employed at these periods of 2.28 per cent. In the selected list Leather shows a decrease of 8.80 per cent; Musical Instruments and Materials a decrease of 6.40 per cent; and Worsted Goods a decrease of 3.72 per cent. Every other industry in the selected list shows a larger number of persons employed in 1891 than in 1890 at the periods of employment of greatest number. Boots and Shoes shows an increase of 0.62 per cent; Carpetings an increase of 1.78 per cent; Cotton Goods an increase of 2.29 per cent; Machines and Machinery an increase of 1.63 per cent; Metals and Metallic Goods an increase of 3.63 per cent; Paper and Paper Goods an increase of 3.60 per cent; and Woollen Goods an increase of 2.14 per cent.

The range of unemployment is clearly shown in the following

analysis table for All Industries, which shows the range in the specified years between the number of persons employed at the periods of employment of smallest number and the periods of employment of greatest number, beginning with the year 1886:

COMPARATIVE YEARS.	Number of Establishments Considered	Aggregates: Persons Employed at Periods of Employment of <i>Smallest</i> Number	Aggregates: Persons Employed at Periods of Employment of <i>Greatest</i> Number	"Range"
1886, . . . . .	1,027	129,843	167,913	38,070
1887, . . . . .	1,027	135,271	172,175	36,904
1887, . . . . .	1,140	149,714	190,194	40,480
1888, . . . . .	1,140	147,593	191,234	43,641
1888, . . . . .	1,364	169,610	221,307	51,697
1889, . . . . .	1,364	176,097	221,449	45,352
1889, . . . . .	3,041	224,887	293,321	68,434
1890, . . . . .	3,041	234,324	300,227	65,903
1890, . . . . .	3,745	251,107	322,288	71,181
1891, . . . . .	3,745	258,771	328,634	70,863

The number of establishments in each group in the foregoing table varies for the reason that the establishments entering into the comparison between the specified years are necessarily those showing returns in each of the years named; and no other establishments can be compared. The first comparison shown in the table is between the years 1886 and 1887, for which we received returns from 1,027 identical establishments. Between the years 1887 and 1888 the comparison is made for 1,140 establishments; between 1888 and 1889 for 1,364 establishments; between 1889 and 1890 for 3,041 establishments; and between 1890 and 1891 for 3,745 establishments. The table presents figures which show the smallest number of persons and the greatest number of persons employed in each year with the difference in range between the two periods. That is to say, in 1886, 38,070 more persons were employed at the periods of employment of greatest number of persons than at the periods of employment of smallest number. In 1887 in the same establishments the difference was 36,904. This method of comparison may be applied to each of the other periods in the table.

In the following table the aggregates have been reduced to

percentages, the number of persons employed at the periods of employment of greatest number constituting 100 per cent :

COMPARATIVE YEARS.	Number of Establishments Considered	Percentages of Persons Employed at Periods of Employment of Smallest Number of Persons Employed at Periods of Employment of Greatest Number	Range (Unemployed at some time During the Year)	Aggregates: Persons Employed at Periods of Employment of Greatest Number
1886, . . . . .	1,027	77.33	22.67	100.00
1887, . . . . .	1,027	78.57	21.43	100.00
1887, . . . . .	1,140	78.72	21.28	100.00
1888, . . . . .	1,140	77.18	22.82	100.00
1888, . . . . .	1,364	76.64	23.36	100.00
1889, . . . . .	1,364	79.52	20.48	100.00
1889, . . . . .	3,041	76.67	23.33	100.00
1890, . . . . .	3,041	78.05	21.95	100.00
1890, . . . . .	3,745	77.91	22.09	100.00
1891, . . . . .	3,745	78.50	21.50	100.00

As we pointed out in a similar comparison last year, when reduced to percentages the range between the aggregates of the persons employed at the periods of employment of the smallest number and of greatest number shows but slight variation in each year. In the foregoing table the least percentage of variation shown in any single case is 20.48, this exhibiting the range between the number of persons employed at the periods of employment of smallest number in 1889 and the number of persons employed at the periods of employment of greatest number in the same year. The greatest percentage of variation is 23.36 occurring in the comparison between the years 1888 and 1889. An inspection of these percentages alone would apparently indicate that about one-fourth of the persons employed in the different industries were out of employment for a greater or less period at certain times during the year. This period of unemployment may be, and often is, very short. In the following table a closer indication of the range of unemployment is afforded by a comparison of the number of persons employed during each month :

MONTHS.	AGGREGATE NUMBER OF PERSONS EMPLOYED IN EACH SPEC- IFIED MONTH		AVERAGE NUMBER OF PERSONS EMPLOYED IN EACH ESTABLISHMENT IN EACH SPECIFIED MONTH	
	1890	1891	1890	1891
January, . . . . .	280,162	291,620	75	78
February, . . . . .	284,266	292,810	76	78
March, . . . . .	287,228	294,264	77	79
April, . . . . .	287,083	294,574	77	79
May, . . . . .	287,842	296,058	77	79
June, . . . . .	289,203	293,115	77	78
July, . . . . .	288,974	290,043	76	77
August, . . . . .	287,987	290,142	77	77
September, . . . . .	292,122	292,876	78	78
October, . . . . .	295,218	293,967	79	78
November, . . . . .	292,987	292,653	78	78
December, . . . . .	291,018	291,690	78	78

On pages 100 to 119 is presented the number of persons employed by sexes during each month of the year for the years 1890 and 1891 in each industry. In the foregoing analysis table the aggregate number of persons employed for All Industries during each specified month of the year has been brought forward, together with the average number of persons employed per establishment. From this table it appears that, although the percentages of unemployment as indicated in the table previously presented range from 22.09 in 1890 to 21.50 in 1891, still when averages for each month are considered no great variation is shown. In 1890 the range was from an aggregate of 280,162 persons employed in the month of January, to 295,218 persons employed in the month of October in the same year; and from 290,043 persons employed in the month of July, in 1891, to 296,058 persons employed in the month of May in the same year. The average number of persons employed per establishment ranges from 75 in the month of January, 1890, to 79 in the month of October in the same year and in 1891, from 77 in the months of July and August to 79 in the months of March, April, and May, respectively, in the same year.

In the following table for All Industries the range of employment is indicated by percentages, the number of persons employed in October in 1890, the month of employment of the greatest number, being considered 100 per cent in that year and

the number of persons employed in the month of May in 1891 being considered 100 per cent, that being the month in which the greatest number of persons was employed in that year.

MONTHS.	PERCENTAGES OF EMPLOYMENT DURING THE MONTHS SPECIFIED		PERCENTAGES OF UNEMPLOYMENT DURING THE MONTHS SPECIFIED	
	1890	1891	1890	1891
January, . . . . .	94.90	98.50	5.10	1.50
February, . . . . .	96.29	98.90	3.71	1.10
March, . . . . .	97.29	99.39	2.71	0.61
April, . . . . .	97.23	99.50	2.77	0.50
May, . . . . .	97.50	100.00	2.50	-
June, . . . . .	97.96	99.01	2.04	0.99
July, . . . . .	96.87	97.97	3.13	2.03
August, . . . . .	97.55	98.00	2.45	2.00
September, . . . . .	98.95	98.93	1.05	1.07
October, . . . . .	100.00	99.29	-	0.71
November, . . . . .	99.24	98.85	0.76	1.15
December, . . . . .	98.58	98.52	1.42	1.48

In the above table the percentages of unemployment are obtained by computing the difference between the percentages of employment appearing in each month and 100 per cent, which appears, as has been stated, in the month during which the greatest number of persons was employed. In 1890 the smallest number of persons employed being in the month of January, 94.90 per cent, the percentage of unemployment for that month becomes 5.10, representing the decline from 100 per cent, the number employed in October, the month of employment of the greatest number. The percentages of unemployment in 1891 are uniformly less month by month than appear in 1890, indicating a larger amount of continuous employment in 1891 than in the year previous. The data contained in the presentation on pages 100 to 119 may be reduced to percentages affording comparison for each industry similar to those made in the preceding table for All Industries. Such a comparison is herewith presented for Boots and Shoes :

MONTHS.	PERCENTAGES OF EMPLOYMENT DURING THE MONTHS SPECIFIED		PERCENTAGES OF UNEMPLOYMENT DURING THE MONTHS SPECIFIED	
	1890	1891	1890	1891
January, . . . . .	89.60	97.57	10.40	2.43
February, . . . . .	91.16	99.09	8.84	0.91
March, . . . . .	91.57	99.29	8.43	0.71
April, . . . . .	91.46	97.32	8.54	2.68
May, . . . . .	93.41	99.24	6.59	0.76
June, . . . . .	96.94	99.22	3.06	0.78
July, . . . . .	96.48	98.25	3.52	1.75
August, . . . . .	100.00	100.00	-	-
September, . . . . .	99.29	99.16	0.71	0.84
October, . . . . .	97.10	96.73	2.90	3.27
November, . . . . .	92.33	92.94	7.67	7.06
December, . . . . .	90.24	93.35	9.76	6.65

In the boot and shoe industry, as appears from the above table, 100 per cent, representing the greatest aggregate number of persons employed, is found in August in each year. The greatest variation from this basis during the year 1890 is found in January the percentage of employment being 89.60 in that month and the percentage of unemployment 10.40. In 1891 the greatest variation is found in the month of November, the percentage of employment at that time being 92.94 and of unemployment 7.06. As was found to be the case in All Industries, the range of unemployment in 1891 is uniformly less month by month than appears in 1890, except in the month of September when practically the full force was employed in each year, the percentages of unemployment amounting to 0.71 in 1890 and 0.84 in 1891.

The presentation on pages 120 to 123 indicates the busy season in each industry by data showing the average number of persons employed for the year contrasted with the number employed in the month in which the greatest number was employed, and with the aggregate number employed at periods of employment of greatest number. Taking, for instance, the boot and shoe industry the table shows the month in which the greatest aggregate number of persons was employed, namely, August in each year. The number of persons employed in this month in 1890 was 47,430 and in 1891 44,381. This may be contrasted with the average number of persons employed for the year, 44,068 in 1890 and 43,343 in 1891, and may also be com-

pared with the aggregate number of persons employed at periods of employment of greatest number which is found to be 51,234 in 1890 and 51,550 in 1891. Similar data appear in the table for each of the industries considered. For All Industries, October is the busy month of the year in 1890 and May in 1891. The number of persons employed in the 3,745 establishments in October, 1890, was 295,218, and in May, 1891, 296,058. The average number of persons employed in 1890, to carry the comparison to the same point that we have already made for Boots and Shoes, was 287,900, and 292,866 in 1891, while the aggregate number of persons employed at periods of employment of greatest number was 322,288 in 1890 and 329,634 in 1891.

The table on pages 124 to 127 shows the number of establishments in each of the industries which reported the same number of persons employed during the entire years 1890 and 1891. Summarizing the final line of this table, we find that in All Industries, 3,745 establishments were considered in the returns and of these 913, or 24.38 per cent, reported the same number of persons employed during the entire year, the total number of persons so employed being 41,533, or 14.43 per cent of the aggregate average number of persons employed in 1890. In 1891 in the 810, or 21.63 per cent of these establishments reporting the same number of persons employed during the entire year, the aggregate number of persons thus employed was 38,204, or 13.04 per cent of the aggregate average number of persons employed.

The final presentation relative to persons employed, contained on pages 128 and 129, presents a comparison of persons employed in the same establishments for the years 1885 and 1890. In All Industries, 3,817 establishments entering into the comparison, an average of 262,469 persons was employed in 1885; in 1890 the number was 286,618 an increase of 24,149 persons, or 9.20 per cent. In Boots and Shoes the increase is 9.24 per cent; in Carpetings 18.42 per cent; in Cotton Goods 7.04 per cent; in Leather 2.38 per cent; in Machines and Machinery 22.23 per cent; in Metals and Metallic Goods 17.13 per cent; in Musical Instruments and Materials 29.24 per cent; in Paper and Paper Goods 9.98 per cent; in Woollen Goods 8.21 per cent; and in Worsted Goods 15.86 per cent. The



establishments considered in the following industries, 25 in number, report a smaller average number of persons employed in 1890 than in 1885: Awnings, Sails, Tents, etc.; Brick, Tiles, and Sewer Pipe; Brooms, Brushes, and Mops; Burial Cases, Caskets, Coffins, etc.; Buttons and Dress Trimmings; Carriages and Wagons; Cooking, Lighting, and Heating Apparatus; Cotton, Woollen, and Other Textiles; Crayons, Pencils, Crucibles, etc.; Drugs and Medicines; Dyestuffs; Electroplating; Fertilizers; Fireworks and Matches; Furniture; Glue, Isinglass, and Starch; Ink, Mucilage, and Paste; Liquors: Malt, Distilled, and Fermented; Lumber; Photographs and Photographic Materials; Printing, Publishing, and Bookbinding; Shipbuilding; Stone; Straw and Palm Leaf Goods; and Trunks and Valises; but it will be noted that these do not include any of the ten leading industries.

### WAGES PAID: BY INDUSTRIES.

The presentation relating to wages paid will be found on pages 132 to 159. The first table, pages 132 and 133, presents the total amount paid in wages during the years 1890 and 1891 in the 3,745 establishments considered, by industries, with the increase or decrease in 1891 in amounts and percentages. In All Industries the total amount disbursed as wages was \$126,080,303 in 1890 and \$129,416,248 in 1891, an increase of \$3,335,945, or 2.65 per cent. In the following table the facts are brought forward for the ten selected industries:

INDUSTRIES.	Number of Establishments Considered	TOTAL AMOUNT PAID IN WAGES DURING THE YEAR		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percentages
Boots and shoes, . . . . .	567	\$22,714,532	\$21,861,711	—\$852,821	—3.75
Carpetings, . . . . .	12	1,691,949	1,753,899	+61,950	+3.66
Cotton goods, . . . . .	157	23,634,881	24,738,653	+1,103,772	+4.67
Leather, . . . . .	154	3,144,285	2,867,027	—277,258	—8.82
Machines and machinery, . . . . .	263	8,652,828	8,962,322	+309,494	+3.58
Metals and metallic goods, . . . . .	277	8,548,999	8,829,038	+280,039	+3.28
Musical instruments and materials, . . . . .	46	1,922,514	1,810,180	—112,334	—5.84
Paper and paper goods, . . . . .	102	4,043,522	4,233,548	+190,026	+4.70
Woollen goods, . . . . .	138	6,174,770	6,616,442	+441,672	+7.15
Worsted goods, . . . . .	21	2,927,448	2,973,680	+46,232	+1.58
Other industries, . . . . .	2,008	42,624,575	44,789,748	+2,165,173	+5.03
ALL INDUSTRIES, . . . . .	3,745	\$126,080,303	\$129,416,248	+\$3,335,945	+2.65

The amount paid in wages in these selected industries formed 66.19 per cent of the total amount paid in 1890 and 65.41 per cent of the total amount paid in 1891. The final line of the table exhibits the facts for All Industries, to which we have just alluded. Three of the industries in the selected list show a decrease in the amount disbursed as wages in the establishments considered in 1891 as compared with 1890. These industries are Boots and Shoes, Leather, and Musical Instruments and Materials, the percentages of decrease being 3.75, 8.82, and 5.84, respectively. Worsted Goods exhibits an increase amounting to 1.58 per cent, or somewhat less than the percentage of increase for All Industries. Carpetings, Cotton Goods, Machines and Machinery, Metals and Metallic Goods, Paper and Paper Goods, and Woollen Goods each shows a percentage of increase greater than the percentage of increase for All Industries. These percentages of increase are as follows: Carpetings 3.66; Cotton Goods 4.67; Machines and Machinery 3.58; Metals and Metallic Goods 3.28; Paper and Paper Goods 4.70; and Woollen Goods 7.15. The largest increase, it will be noted, appears in Woollen Goods.

The presentation on pages 134 and 135 exhibits the average yearly earnings in each industry. The figures have been obtained, as explained in the head-note of the table, by dividing the total amount paid in wages in each year by the average number of persons employed during the year. The relative increase or decrease in average yearly earnings in 1891 as compared with 1890 is given with its equivalent percentage. Confining our analysis to the ten selected industries we present the following table:

INDUSTRIES.	Number of Estab- lishments Con- sidered	AVERAGE YEARLY EARNINGS		INCREASE (+), OR DECREASE (-), IN 1891	
		1890	1891	Amounts	Percent- ages
Boots and shoes, . . . . .	567	\$515.44	\$504.39	-\$11.05	-2.14
Carpetings, . . . . .	12	365.04	375.41	+10.37	+2.84
Cotton goods, . . . . .	157	334.79	343.78	+8.99	+2.69
Leather, . . . . .	154	512.35	520.14	+7.79	+1.52
Machines and machinery, . . . . .	263	550.82	555.98	+5.16	+0.94
Metals and metallic goods, . . . . .	277	500.06	508.20	+8.14	+1.63
Musical instruments and materials, . . . . .	46	665.46	672.43	+6.97	+1.05
Paper and paper goods, . . . . .	102	422.34	428.80	+6.46	+1.53
Woollen goods, . . . . .	138	367.20	378.54	+11.34	+3.09
Worsted goods, . . . . .	21	367.63	373.34	+5.71	+1.55
Other industries, . . . . .	2,008	461.22	466.95	+5.73	+1.24
ALL INDUSTRIES, . . . . .	3,745	\$437.93	\$441.90	+\$3.97	+0.91

The final line of the foregoing table indicates the average yearly earnings in All Industries for each of the years considered. This average is \$437.93 in 1890 and \$441.90 in 1891, a slight increase amounting to 0.91 per cent. Each of the selected industries except Boots and Shoes shows a larger percentage of increase than is here indicated for All Industries. In Boots and Shoes the average yearly earnings in 1890 were \$515.44 and \$504.39 in 1891, a decline of 2.14 per cent. The largest increase in average yearly earnings in 1891 as compared with 1890 is found in Woollen Goods, the average rising from \$367.20 in 1890 to \$378.54 in 1891, an increase of 3.09 per cent. This, however, is approached by the increase in Carpetings in which the average yearly earnings rose from \$365.04 in 1890 to \$375.41 in 1891, an increase of 2.84 per cent. In Leather the increase is from \$512.35 in 1890 to \$520.14 in 1891, an increase of 1.52 per cent. In Metals and Metallic Goods the increase is nearly the same, or 1.63 per cent, measuring the rise from \$500.06 to \$508.20. In Musical Instruments and Materials, Paper and Paper Goods, and Worsted Goods the percentages of increase are also very similar, being 1.05, 1.53, and 1.55, respectively. In Machines and Machinery we find an increase from \$550.82 to \$555.98, or 0.94 per cent.

A comparison of wages paid in the same establishments for the years 1885 and 1890 may be found on pages 136 and 137, followed by a comparison of average yearly earnings, based upon the total amount of wages paid, for the same years, pages 138 and 139.

Referring to these tables, and confining our analysis to the ten principal industries previously presented in detail, we find that the total amount paid out in wages in the establishments considered in Boots and Shoes exhibits an increase in 1890 as compared with 1885 of 29.95 per cent; in Carpetings 42.11 per cent; in Cotton Goods 34.07 per cent; in Leather 18.49 per cent; in Machines and Machinery 56.27 per cent; in Metals and Metallic Goods 34.03 per cent; in Musical Instruments and Materials 39.83 per cent; in Paper and Paper Goods 26.13 per cent; in Woollen Goods 25.17 per cent; and in Worsted Goods 47.67 per cent. In All Industries, for 3,817 establishments making returns in each of the years named, the increase was from \$96,237,455 disbursed as wages in 1885 to \$125,999,921 paid out in 1890, an increase of \$29,762,466, or 30.93 per cent.

Turning now to the comparison of average yearly earnings, and confining our attention to the ten principal industries, we find that the average yearly earnings increased in Boots and Shoes to the amount of 18.96 per cent; in Carpetings 20 per cent; in Cotton Goods 25.25 per cent; in Leather 15.73 per cent; in Machines and Machinery 27.85 per cent; in Metals and Metallic Goods 14.43 per cent; in Musical Instruments and Materials 8.19 per cent; in Paper and Paper Goods 14.68 per cent; in Woollen Goods 15.67 per cent; and in Worsted Goods 27.46 per cent. In All Industries the average rose from \$366.66 in 1885 to \$439.61 in 1890, an increase of \$72.95 or 19.90 per cent. When it is remembered that these returns are from the same establishments in each of the years named the effect of the comparison becomes more striking. In only seven industries out of the total number considered is a decline in average yearly earnings found. These are Corks, Bungs, and Taps, in which two establishments entered into the comparison; Earthen, Plaster, and Stone Ware, five establishments being considered; Glass, numbering 12 establishments, in which the average yearly earnings dropped from \$555.63 in 1885 to \$474.69 in 1890; Hose: Rubber, Linen, etc., numbering only three establishments; Paints, Colors, and Crude Chemicals, 12 establishments making returns and the decline being very slight, from \$491.19 in 1885 to \$481.80 in 1890; Sporting and Athletic Goods, numbering nine establishments, declining from \$469.18 in 1885 to \$448.83 in 1890; and Whips, Lashes, and Stocks, 11 establishments reporting and the decline being from \$428.09 in 1885 to \$404.26 in 1890.

With respect to the average earnings per employé and the bearing of comparisons relating to wages based upon such average rates, we stated in the report on Statistics of Manufactures last year that "the apparent increase or decrease in average yearly earnings, while to a certain extent indicative of fluctuations in employment, has but limited significance when considered alone, as many conditions affect these averages. The fact that the average number of persons employed is used as the divisor in obtaining the average, and the total amount paid in wages as the dividend, implies that an uncertain figure, having no real statistical value when considered apart from other elements, will be the result of this division, for the males and females, young persons and adults, day hands and piece hands,

are indiscriminately included in the average number of persons employed." The difference in the proportions of males and females employed, the different proportions of day and piece hands, the greater proportion of adult employes in some industries than in others, and the different degrees of skill required in some industries, all affect the average yearly earnings and account for the fluctuations observed between the different industries. The following table supplies the necessary data for a comparison of average yearly earnings in 1891, with the different proportions of the sexes employed, day and piece hands, and the different proportions of adult persons employed in the different industries drawn from the Decennial Census of 1885:

Average Yearly Earnings 1891	INDUSTRIES.	PERCENTAGES					
		PERSONS EMPLOYED		DAY AND PIECE HANDS: BOTH SEXES		AGE PERIODS: BOTH SEXES	
		Males	Females	Day Hands	Piece Hands	Under 21 years	21 years and over
\$685.76	Shipbuilding, . . . . .	99.35	0.65	95.31	4.69	5.02	94.98
684.58	Fertilizers, . . . . .	99.38	0.62	99.79	0.21	1.66	98.34
681.41	Liquors: malt, distilled, and fermented, . . . . .	99.61	0.39	98.95	1.05	3.41	96.59
672.43	Musical instruments and materials, . . . . .	98.10	1.90	46.70	53.30	8.19	91.81
624.71	Fine arts and taxidermy, . . . . .	77.78	22.22	100.00	-	5.55	94.45
619.85	Cooking, lighting, and heating apparatus, . . . . .	98.68	1.32	67.22	32.78	7.16	92.84
617.03	Awnings, sails, tents, etc., . . . . .	51.14	48.86	93.18	6.82	12.50	87.50
616.87	Photographs and photographic materials, . . . . .	56.89	43.11	98.37	6.63	16.40	83.60
614.06	Electrical apparatus and appliances, . . . . .	98.74	1.26	96.65	3.35	11.17	88.83
609.55	Arms and ammunition, . . . . .	92.16	7.84	75.48	24.52	18.65	81.35
593.77	Chemical preparations (compounded), . . . . .	97.89	2.11	100.00	-	5.98	94.02
590.74	Carriages and wagons, . . . . .	98.71	1.29	80.55	19.45	7.26	92.74
590.53	Railroad construction and equipment, . . . . .	99.22	0.78	100.00	-	3.81	96.19
589.93	Trunks and valises, . . . . .	94.44	5.56	99.49	0.51	17.68	82.32
578.55	Tobacco, snuff, and cigars, . . . . .	69.85	30.15	27.86	72.14	20.07	79.93
573.81	Crayons, pencils, crucibles, etc., . . . . .	85.11	14.89	70.21	29.79	24.47	75.53
568.62	Clocks, watches, and jewelry, . . . . .	60.66	39.34	39.44	60.56	14.34	85.66
561.24	Printing, publishing, and bookbinding, . . . . .	72.40	27.60	72.49	27.51	26.49	73.51
560.00	Artisans' tools, . . . . .	96.69	3.31	76.51	23.49	9.63	90.37
556.12	Stone, . . . . .	99.93	0.07	70.95	29.05	5.14	94.86
555.98	Machines and machinery, . . . . .	98.57	1.43	93.90	6.10	11.60	88.40
541.95	Models and patterns, . . . . .	91.02	8.98	97.60	2.40	10.78	89.22
538.88	Oils and illuminating fluids, . . . . .	96.83	3.17	96.60	3.40	6.57	93.43
530.75	Liquors and beverages (not spirituous), . . . . .	96.74	3.26	100.00	-	7.49	92.51
527.88	Polishes and dressing, . . . . .	84.81	15.19	97.91	2.09	10.45	89.55
526.47	Wooden goods, . . . . .	95.31	4.69	70.90	29.10	15.28	84.72
521.26	Dyestuffs, . . . . .	96.20	3.80	94.57	5.43	4.35	95.65
520.14	Leather, . . . . .	97.85	2.15	78.85	21.15	9.32	90.68

Average Yearly Earn- ings 1891	INDUSTRIES.	PERCENTAGES					
		PERSONS EMPLOYED		DAY AND PIECE HANDS: BOTH SEXES		AGE PERIODS: BOTH SEXES	
		Males	Fe- males	Day Hands	Piece Hands	Under 21 years	21 years and over
\$518.68	Agricultural implements, . . . .	100.00	-	62.48	37.52	8.89	91.11
509.09	Electroplating, . . . . .	97.12	2.88	85.61	14.39	20.14	79.86
508.20	Metals and metallic goods, . . . .	90.95	9.05	73.69	26.31	14.88	85.12
506.85	Emery and sand paper and cloth, etc.,	93.89	6.31	97.57	2.43	10.19	89.81
506.59	Burial cases, caskets, coffins, etc.,	85.51	14.49	74.72	25.28	9.94	90.06
504.39	Boots and shoes, . . . . .	69.46	30.54	31.06	68.94	14.79	85.21
503.51	Paints, colors, and crude chemicals, .	97.31	2.69	100.00	-	5.38	94.62
495.12	Cement, kaolin, lime, and plaster, .	100.00	-	98.27	1.73	6.94	93.06
486.36	Lumber, . . . . .	99.74	0.26	93.13	6.87	5.50	94.50
485.97	Furniture, . . . . .	91.00	9.00	64.88	35.12	17.28	82.72
485.14	Food preparations, . . . . .	82.28	17.72	92.40	7.60	14.09	85.91
475.52	Tallow, candles, soap, and grease, .	93.73	6.27	88.09	11.91	11.85	88.15
471.88	Earthen, plaster, and stone ware, .	92.57	7.43	77.72	22.28	18.83	81.17
454.16	Glass, . . . . .	88.70	11.30	96.18	3.87	17.72	82.28
453.72	Ivory, bone, shell, and horn goods, etc.,	91.09	8.91	71.14	28.86	26.83	73.17
452.46	Glue, isinglass, and starch, . . . .	96.13	3.87	98.90	1.10	17.86	82.14
444.62	Whips, lashes, and stocks, . . . .	64.41	35.59	49.82	50.18	12.63	87.37
441.88	Straw and palm leaf goods, . . . .	36.07	63.93	12.16	87.84	15.30	84.70
439.01	Sporting and athletic goods, . . . .	85.09	14.91	48.11	51.89	13.58	86.42
431.99	Brick, tiles, and sewer pipe, . . . .	99.09	0.91	96.97	3.03	6.16	93.84
430.60	Hose: rubber, linen, etc., . . . . .	78.18	21.82	96.36	3.64	23.64	76.36
423.80	Paper and paper goods, . . . . .	56.08	43.92	74.29	25.71	15.70	84.30
426.18	Print works, dye works, and bleacheries,	65.17	34.83	72.14	27.86	19.30	80.70
425.89	Rubber and elastic goods, . . . . .	58.22	41.78	50.10	49.90	19.09	80.31
420.37	Scientific instruments and appliances,	82.84	17.16	74.97	25.03	20.64	79.36
416.44	Perfumes, toilet articles, etc., . . . .	51.06	48.94	70.21	29.79	19.15	80.85
412.55	Drugs and medicines, . . . . .	71.17	28.83	83.77	16.23	21.82	78.18
411.60	Ink, mudclage, and paste, . . . . .	82.26	17.74	96.77	3.23	40.32	59.68
401.77	Clothing, . . . . .	28.25	71.75	51.24	48.76	16.04	83.06
397.49	Toys and games (children's), . . . .	82.46	17.54	44.00	56.00	30.77	69.23
390.62	Cotton, woollen, and other textiles, .	50.54	49.46	60.29	39.71	25.81	74.19
387.41	Boxes (paper and wooden), . . . . .	55.62	44.38	59.51	40.49	24.37	75.63
385.85	Mixed textiles, . . . . .	54.67	45.33	77.78	22.22	24.89	75.11
378.54	Woollen goods, . . . . .	61.60	38.40	60.09	39.91	27.45	72.55
375.41	Carpetings, . . . . .	42.12	57.88	59.70	40.30	32.58	67.47
373.34	Worsted goods, . . . . .	42.13	57.87	69.04	30.96	35.59	64.41
372.77	Fireworks and matches, . . . . .	69.61	30.39	91.18	8.82	42.16	57.84
365.67	Hair work (animal and human), . . . .	38.94	61.06	90.87	9.13	26.44	73.56
353.20	Silk and silk goods, . . . . .	29.73	70.27	79.35	20.65	33.96	66.04
352.10	Brooms, brushes, and mops, . . . . .	62.32	37.68	64.33	35.67	30.10	69.90
349.92	Buttons and dress trimmings, . . . .	30.15	69.85	71.77	28.23	22.93	77.07
343.78	Cotton goods, . . . . .	44.96	55.04	44.16	55.84	35.89	64.11
336.04	Cordage and twine, . . . . .	53.21	46.79	86.82	13.18	37.81	62.19
333.26	Hosiery and knit goods, . . . . .	29.13	70.87	28.55	71.45	29.81	70.19
321.72	Flax, hemp, jute, and linen goods, .	51.57	48.43	75.31	24.69	43.76	56.24
310.83	Corks, bungs, and taps, . . . . .	63.29	36.71	100.00	-	55.70	44.30
287.22	Fancy articles, . . . . .	49.09	50.91	62.73	37.27	31.82	68.18
\$441.00	ALL INDUSTRIES, . . . . .	67.00	33.00	58.17	41.83	20.49	79.51

The method of reading the above table is plain. Taking a leading industry at random from this list, for instance, Leather, we find that, in 1891, the average yearly earnings were \$520.14; in this industry 97.85 per cent of the persons employed were males, and 2.15 per cent females; 78.85 per cent were day hands, and 21.15 per cent piece hands; only 9.32 per cent were under twenty-one years of age, while 90.68 per cent of all the employes were twenty-one years of age and over. Contrasting this industry with another leading industry in which the wages are relatively considerably less, for instance, Woollen Goods, we find that the average yearly earnings in the last named industry were \$378.54; but 38.40 per cent of the persons employed in this industry were females; the percentages of day and piece hands were 60.09 and 39.91, respectively, while 27.45 per cent of the employes were under twenty-one years of age. Such information partly explains the differences in average yearly earnings.

Much more important, however, than any comparison of averages is the classification of wages shown on pages 140 to 159 for the years 1890 and 1891. Comparisons based upon such classification of weekly wages in each of the industries, are much more indicative of the real conditions as to the rate of wages than any average that can possibly be made. The following analysis table reproduces on the percentage basis the facts for All Industries drawn from the classified wage presentation:

CLASSIFICATION OF WEEKLY WAGE.	PERCENTAGES			
	1890		1891	
	Males	Females	Males	Females
Under \$5, . . . .	38.15	61.85	37.33	62.67
\$5 but under \$6, . . .	32.78	67.22	33.56	66.44
\$6 but under \$7, . . .	46.19	53.81	45.65	54.35
\$7 but under \$8, . . .	56.32	43.68	55.76	44.24
\$8 but under \$9, . . .	65.10	34.90	63.69	36.31
\$9 but under \$10, . . .	80.95	19.05	81.24	18.76
\$10 but under \$12, . . .	86.82	13.18	86.54	13.46
\$12 but under \$15, . . .	93.35	6.65	93.87	6.13
\$15 but under \$20, . . .	97.53	2.47	97.36	2.64
\$20 and over, . . . .	99.03	0.97	99.06	0.94
TOTALS, . . . .	66.51	33.49	66.35	33.65

In this table the total number of employes in each class is considered as 100 per cent. Bearing this in mind we note that, in 1890, of all the operatives receiving less than \$5 per week, 38.15 per cent were males and 61.85 per cent females, the corresponding percentages in this wage class for the year 1891 being 37.33 males and 62.67 females. The comparison indicates that the respective proportions of the sexes in this wage class do not greatly vary in either year; and the same statement is found to be true with respect to every other wage class. The fluctuations between the wage classes clearly appear in the following analysis table :

CLASSIFICATION OF WEEKLY WAGE.	PERCENTAGES					
	1890			1891		
	Males	Females	Total	Males	Females	Total
Under \$5, . . . . .	8.47	27.28	14.77	8.08	26.76	14.37
\$5 but under \$6, . . . .	4.48	18.25	9.09	4.69	18.30	9.27
\$6 but under \$7, . . . .	8.23	19.04	11.85	7.98	18.72	11.59
\$7 but under \$8, . . . .	8.70	13.41	10.28	8.72	13.63	10.37
\$8 but under \$9, . . . .	8.06	8.58	8.23	8.16	9.17	8.50
\$9 but under \$10, . . . .	12.64	5.91	10.39	13.23	6.03	10.80
\$10 but under \$12, . . . .	14.51	4.37	11.11	14.33	4.40	10.99
\$12 but under \$15, . . . .	16.98	2.40	12.10	16.97	2.19	12.00
\$15 but under \$20, . . . .	13.37	0.67	9.12	13.44	0.72	9.16
\$20 and over, . . . . .	4.56	0.09	3.06	4.40	0.08	2.95
TOTALS, . . . . .	100.00	100.00	100.00	100.00	100.00	100.00

In the above table the total number of males, the total number of females, and the total number of employes of both sexes are each considered as representing 100 per cent. Taking the first line of the table we note that, in 1890, 8.47 per cent of all the males, 27.28 per cent of all the females, and 14.77 per cent of all the employes without regard to sex received less than \$5 per week. The corresponding percentages for 1891 are males 8.08, females 26.76, and all employes 14.37. The medium wage class, or that in which the proportion of each sex is about the same and is also similar to the proportion of all employes receiving the specified wage, is the class receiving \$8 but under \$9 per week. In this class appear, in 1890, 8.06 per cent of all the males, 8.58 per cent of all the females, and 8.23 per cent of all employes, the respective percentages in 1891 being 8.16, 9.17, and 8.50. The percentages of females



receiving the specified wage rapidly decline in each wage class above that receiving \$8 but under \$9. On the other hand, the percentages of males of all the males continuously increase above this level until the wage class receiving \$15 but under \$20 is reached when a slight drop appears, 13.37 per cent of all the males being in this class. The wage class above this is that in which \$20 and over are paid, 4.56 per cent of all the males appearing in it in 1890 and 4.40 per cent in 1891. In this class are found 0.09 per cent of all the females in 1890 and 0.08 per cent in 1891.

### PROPORTION OF BUSINESS DONE: BY INDUSTRIES.

This subject is treated statistically on pages 163 to 214. The first division of the subject is contained in the table on pages 163 to 181 and will be first analyzed.

#### PROPORTION OF BUSINESS DONE.

In the table relating to this division of the subject, greatest capacity or maximum production, that is to say, the greatest amount of goods that can be turned out with the present facilities in the different establishments, is 100 per cent. We refer first to the recapitulation to be found on pages 180 and 181. The final line of this recapitulation shows that in the 3,745 establishments in All Industries the relative proportion of business done in 1890 amounted to 70.27 per cent of the full capacity of the establishments. This percentage declined in 1891 to 69.27 per cent, presenting a net decline of one per cent. We confine the analysis in detail to the ten principal industries. In Boots and Shoes 567 establishments are represented, the proportion of business done being 70.21 per cent in 1890, declining to 66.06 per cent in 1891. In Carpetings 12 establishments appear, the proportion of business done in 1890 being 78.25 per cent, rising in 1891 to 80.83 per cent. In the 157 establishments in Cotton Goods the proportion of business done in 1890 was 91.23 per cent of the full capacity and in 1891, 91.97 per cent, showing that, so far as the output is concerned in this industry, the conditions were about the same in each year. In Leather 154 establishments appear, the proportion of business done being 70.71 per cent in 1890, declining to

to 64.42 per cent of full capacity in 1891. In Machines and Machinery a decline is noted from 69.27 per cent in 1890 to 67.54 per cent in 1891, 263 establishments making returns. In Metals and Metallic Goods, on the other hand, the proportion of business done increased from 69.26 per cent in 1890 to 70.60 per cent in 1891, 277 establishments appearing. In Musical Instruments and Materials 46 establishments are found, the proportion of business done declining from 74.76 per cent in 1890 to 72.33 per cent in 1891. In Paper and Paper Goods 102 establishments are included, the proportion of business done in 1890 being 84 per cent and in 1891 84.62 per cent. In Woollen Goods 138 establishments appear, the proportion of business done in 1890 being 82.61 per cent rising in 1891 to 84.38 per cent. In the 21 establishments in Worsted Goods the proportion of business done is represented by nearly equivalent percentages in each year, the exact figures being 88.24 in 1890 and 88.29 in 1891. All the establishments in one industry only appear from the returns to have run to their full capacity in 1890. This is Fine Arts and Taxidermy, the number of establishments making returns being two only. These two establishments in 1891 ran to but 85 per cent of their full capacity. No other industry in the list returns its establishments as having run to full capacity in either year. The nearest approach to it is Cotton Goods, the percentages, as previously quoted, being 91.23 in 1890 and 91.97 in 1891.

In the detail tabular presentation which precedes the recapitulation it will be found that a certain number of establishments in most of the industries are reported as running to their full capacity, or 100 per cent. The following table enables a comparison to be made of the number of establishments running to full capacity with the total number of establishments in All Industries.

CLASSIFICATION	NUMBER OF ESTABLISHMENTS		PERCENTAGES	
	1890	1891	1890	1891
Full capacity (100 per cent), . . .	574	522	15.33	13.94
Less than full capacity, . . .	3,171	3,223	84.67	86.06
. TOTALS, . . . . .	3,745	3,745	100.00	100.00

This table shows that the number of establishments running to their fullest capacity in 1890, 574, constituted 15.33 per cent of the entire number of establishments making returns, while the number of establishments running to their full capacity in 1891 constituted only 13.94 per cent of the total number of establishments. It follows, however, that in 1890 84.67 per cent of the total number of establishments making returns were run to less than their full capacity, while in 1891, 86.06 per cent of these same establishments presented similar conditions.

As usual we present a classification of percentages indicating the proportion of business done and the number of establishments in each percentage class in 1890 and 1891, together with the relative percentages which such establishments bore to the total number of establishments in each year.

CLASSIFICATION OF PERCENTAGES.	NUMBER OF ESTABLISHMENTS		PERCENTAGES	
	1890	1891	1890	1891
Under 10 per cent, . . . . .	2	4	0.05	0.11
10 but under 20 per cent, . . . .	55	63	1.47	1.68
20 but under 30 per cent, . . . .	178	194	4.75	5.18
30 but under 40 per cent, . . . .	126	143	3.37	3.82
40 but under 50 per cent, . . . .	69	97	1.84	2.59
50 but under 60 per cent, . . . .	688	616	18.37	16.45
60 but under 70 per cent, . . . .	351	432	9.37	11.53
70 but under 80 per cent, . . . .	870	828	23.23	22.11
80 but under 90 per cent, . . . .	442	440	11.80	11.75
90 but under 100 per cent, . . . .	390	406	10.42	10.84
100 per cent, . . . . .	574	522	15.33	13.94
TOTALS, . . . . .	3,745	3,745	100.00	100.00

The line preceding the total in the above table repeats the fact just noted, that 15.33 per cent of all the establishments were run to their full capacity of production, or 100 per cent, in 1890 and only 13.94 per cent exhibited like conditions in 1891. The greatest condensation in the proportion of business done in each year appears in the class reporting 70 but under 80 per cent, the proportion of establishments so reporting being 23.23 in 1890 and 22.11 in 1891. Not only does a decline appear in the proportion of establishments running to their full capacity in 1891 as compared with 1890 but a decline

also appears in the proportion of establishments reporting 50 but under 60 per cent, 70 but under 80 per cent, and 80 but under 90 per cent. On the other hand, an increased proportion of establishments is found in the class reporting that the proportion of business done was less than 10 per cent of their full capacity and also in the classes reporting 10 but under 20 per cent, 20 but under 30 per cent, 30 but under 40 per cent, 40 but under 50 per cent, 60 but under 70 per cent, and 90 but under 100 per cent.

#### DAYS IN OPERATION.

The second division of the subject "Proportion of Business Done" relates to the number of days the different establishments were in operation. The statistical presentation relating to this division of the subject is given on pages 182 to 214. In the table the number of days each establishment considered was in operation is shown, together with the aggregate average number of persons employed in such establishments during the specified number of days for the years 1890 and 1891. The recapitulation is found on pages 211 and 212. In the detailed presentation a certain number of establishments in each of the industries will be found to have run the entire year. The total number of such establishments in comparison with the number in operation less than the entire year, in All Industries, is brought forward in the following table, with percentages:

CLASSIFICATION.	NUMBER OF ESTABLISHMENTS		PERCENTAGES	
	1890	1891	1890	1891
In operation during the entire year, .	1,601	1,551	42.75	41.42
In operation less than the entire year,	2,144	2,194	57.25	58.58
TOTALS, . . . . .	3,745	3,745	100.00	100.00

The above table shows that, out of the total number of establishments in All Industries, 1,601 were in operation during the entire year in 1890 while in 1891 only 1,551 of these same establishments were thus in operation. That is to say, 42.75 per cent of the establishments entering into the comparison were in operation during the entire year in 1890 but in 1891 only 41.42 per cent of these establishments were thus in opera-

tion. On the other hand, 57.25 per cent of the establishments were in operation less than the entire year in 1890 and 58.58 per cent in 1891.

The total number of working days in the year is 306, Sundays and holidays being omitted. Therefore, whenever establishments have reported that they were in operation 306 days they have been considered as running the whole year. If in operation more than 306 days they must have run not only every working day in the year but either holidays or Sundays. Therefore, in making up the totals for the establishments which ran the entire year, those running either 306 days or a number in excess of 306 days have been included.

In the following table the establishments are classified with respect to the number of days in operation, so far as relates to All Industries :

CLASSIFICATION OF DAYS IN OPERATION.	NUMBER OF ESTABLISHMENTS		PERCENTAGES	
	1890	1891	1890	1891
Under 100 days, . . . . .	31	30	0.83	0.80
100 days but under 150 days, . . . . .	35	42	0.93	1.12
150 days but under 200 days, . . . . .	92	110	2.46	2.94
200 days but under 250 days, . . . . .	221	237	5.90	6.33
250 days but under 300 days, . . . . .	883	882	23.58	23.55
300 days but under 306 days, . . . . .	882	893	23.55	23.85
306 days and over, . . . . .	1,601	1,551	42.75	41.41
TOTALS, . . . . .	3,745	3,745	100.00	100.00

As we have just stated, establishments running 306 days and over were in operation for a full year; and the line preceding the totals in the above table exhibits the number of such establishments and shows that they formed 42.75 per cent of all the establishments considered in 1890 and 41.41 per cent in 1891. Excluding vacations as well as holidays and Sundays, it will be proper to assume that establishments running 300 days and over also ran a full year. Including with the class which ran 306 days and over those which ran 300 days but under 306 days, which, as shown in the table comprised 23.55 per cent of the total number of establishments in 1890 and 23.85 per cent in 1891, we find that the number of establishments running the entire year formed 66.30 per cent of the total number of establishments in 1890 and 65.26 per cent in 1891.

## SUMMARY.

The leading factors relative to the condition of the various industries in 1890 and 1891 are brought before the reader in the series of tables which follows. In these tables the industries are separated into classes. The first class comprises those industries showing an increase in the average number of days in operation and in the proportion of business done in 1891 as compared with 1890; the second class, those industries which show an increase in the average number of days in operation but a decrease in the average proportion of business done; third class, industries showing a decrease in the average number of days in operation but a greater proportion of business done; and fourth and last class, industries which show a decrease in the average number of days in operation and in the average proportion of business done. The percentages of increase or decrease in the proportion of business done are based upon the possible productive capacity of the establishments, and not upon the aggregate value of goods manufactured in 1891.

The table relating to the first class follows:

INDUSTRIES.	INCREASE (+), OR DECREASE (-), IN 1891 AS COMPARED WITH 1890 IN—				
	Average Number of Days in Operation	Average Proportion of Business Done	Average Yearly Earnings	Average Number of Persons Employed	"Range"
Burial cases, caskets, coffins, etc., . . . . .	+0.27	+6.67	—\$45.82	+13	—3
Carpetings, . . . . .	+4.19	+2.58	+10.37	+87	+166
Cooking, lighting, and heating apparatus, . . . . .	+4.67	+2.39	+6.80	+133	+75
Cordage and twine, . . . . .	+6.26	+2.76	+1.03	+335	+292
Cotton goods, . . . . .	+5.11	+0.74	+8.99	+1,364	+353
Electroplating, . . . . .	+14.33	+2.20	+19.30	+2	+2
Emery and sand paper and cloth, etc., . . . . .	+10.27	+5.39	—25.96	+56	+6
Food preparations, . . . . .	+6.01	+0.43	+13.24	+648	—40
Hair work (animal and human), . . . . .	+5.85	+3.50	—30.86	—8	—26
Hose: rubber, linen, etc., . . . . .	+12.66	+13.60	—43.49	+58	+9
Hosiery and knit goods, . . . . .	+2.64	+0.52	+7.29	+1,053	—260
Ivory, bone, shell, and horn goods, etc., . . . . .	+0.01	+1.85	+40.25	+43	+22
Liquors and beverages (not spirituous), . . . . .	+8.96	+1.66	—73.31	+11	+8
Liquors: malt, distilled, and fermented, . . . . .	+6.51	+7.73	+5.06	+81	+65
Metals and metallic goods, . . . . .	+0.74	+1.34	+8.14	+277	+487
Models and patterns, . . . . .	+0.07	+2.60	—24.56	+1	—1
Paints, colors, and crude chemicals, . . . . .	+2.42	*=	+7.19	—2	+9
Paper and paper goods, . . . . .	+2.69	+0.62	+6.46	+299	+11
Perfumes, toilet articles, etc., . . . . .	+0.71	+2.50	+22.95	+1	+4
Stone, . . . . .	+1.23	+1.41	+23.37	+1	+331
Tobacco, snuff, and cigars, . . . . .	+1.79	+5.40	—8.35	+113	—61
Toys and games (children's), . . . . .	+1.05	+6.25	—3.56	+41	+97
Whips, lashes, and stocks, . . . . .	+1.66	+6.00	+31.31	+1	—3
Woollen goods, . . . . .	+4.94	+1.77	+11.34	+663	—558
Worsted goods, . . . . .	+0.13	+0.05	+5.71	+2	—361

\* No change.

It will be remembered that the industries grouped in this table are those showing an increase in the average number of days in operation and in the proportion of business done in 1891 as compared with 1890. The different percentages of increase regarding each of these points may be readily determined from the table. The leading industries which appear in this class are Carpetings; Cotton Goods; Metals and Metallic Goods; Paper and Paper Goods; Woollen Goods; and Worsted Goods. But it will be noted that the increase in the average proportion of business done in each of these industries is quite small when reduced to the percentage basis. The following industries in this class exhibit an increase in average yearly earnings: Carpetings; Cooking, Lighting, and Heating Apparatus; Cordage and Twine; Cotton Goods; Electroplating; Food Preparations; Hosiery and Knit Goods; Ivory, Bone, Shell, and Horn Goods, etc.; Liquors: Malt, Distilled, and Fermented; Metals and Metallic Goods; Paper and Paper Goods; Perfumes, Toilet Articles, etc.; Stone; Whips, Lashes, and Stocks; Woollen Goods; and Worsted Goods.

The average number of persons employed increased in all the industries in this class except Hair Work (Animal and Human), although in some industries the increase was very small.

The range of unemployment, that is, the difference between the smallest and greatest number of persons employed, was narrower in 1891 than in 1890 in the following industries: Burial Cases, Caskets, Coffins, etc.; Food Preparations; Hair Work (Animal and Human); Hosiery and Knit Goods; Models and Patterns; Tobacco, Snuff, and Cigars; Whips, Lashes, and Stocks; Woollen Goods; and Worsted Goods. This range was wider in 1891 than in 1890 in Carpetings; Cooking, Lighting, and Heating Apparatus; Cordage and Twine; Cotton Goods; Electroplating; Emery and Sand Paper and Cloth, etc.; Hose: Rubber, Linen, etc.; Ivory, Bone, Shell, and Horn Goods, etc.; Liquors and Beverages (Not Spirituous); Liquors: Malt, Distilled, and Fermented; Metals and Metallic Goods; Paper and Paper Goods; Perfumes, Toilet Articles, etc.; Stone; and Toys and Games (Children's). But, like the differences in the average number of persons employed, the changes are in most cases very

slight. We include in this class Paints, Colors, and Crude Chemicals which shows an increase in average number of days in operation but no change as to proportion of business done; in this industry an increase is shown as regards average yearly earnings but a decrease in number of persons employed and a wider range of unemployment in 1891 than in 1890.

Industries of the second class are arranged in the following table :

INDUSTRIES.	INCREASE (+), OR DECREASE (-), IN 1891 AS COMPARED WITH 1890 IN —				
	Average Number of Days in Operation	Average Proportion of Business Done	Average Yearly Earnings	Average Number of Persons Employed	"Range"
Artisans' tools, . . . . .	+2.94	-2.30	+\$11.42	+9	-8
Boots and shoes, . . . . .	+0.12	-4.15	-11.05	-72	-571
Cotton, woollen, and other textiles, . . . . .	+10.52	-5.66	+16.70	+165	-65
Electrical apparatus and appliances, . . . . .	+3.72	-5.60	+58.28	+65	+510
Fancy articles, . . . . .	+4.89	-2.66	+8.29	-25	-21
Fine arts and taxidermy, . . . . .	*=	-15.00	-22.58	*=	+4
Fireworks and matches, . . . . .	+14.85	-1.67	+81.90	+19	-11
Glass, . . . . .	+5.54	-3.80	-5.79	+30	-57
Musical instruments and materials, . . . . .	+1.66	-2.43	+6.97	-197	-68
Polishes and dressing, . . . . .	+0.01	-1.11	+54.83	-11	+5
Printing, publishing, and bookbinding, . . . . .	+2.24	-3.84	+6.21	+41	+48
Scientific instruments and appliances, . . . . .	+0.71	-1.36	-11.78	+98	-10
Sporting and athletic goods, . . . . .	+7.26	-1.56	-5.98	+44	+84

\* No change.

These industries are those which show an increase in the average number of days in operation and a decrease in the average proportion of business done. Of these industries, the following show an increase in average yearly earnings: Artisans' Tools; Cotton, Woollen, and Other Textiles; Electrical Apparatus and Appliances; Fancy Articles; Fireworks and Matches; Musical Instruments and Materials; Polishes and Dressing; and Printing, Publishing, and Bookbinding. The following show a decrease in average yearly earnings: Boots and Shoes; Glass; Scientific Instruments and Appliances; and Sporting and Athletic Goods. The leading industries in this class are Boots and Shoes and Musical Instruments and Materials.

In Artisans' Tools; Cotton, Woollen, and Other Textiles; Electrical Apparatus and Appliances; Fireworks and Matches;



Glass; Printing, Publishing, and Bookbinding; Scientific Instruments and Appliances; and Sporting and Athletic Goods the average number of persons employed shows an increase, while in Boots and Shoes; Fancy Articles; Musical Instruments and Materials; and Polishes and Dressing a decrease is shown in this respect.

The range of unemployment is wider in 1891 than in 1890 in Electrical Apparatus and Appliances; Polishes and Dressing; Printing, Publishing, and Bookbinding; and Sporting and Athletic Goods, and narrower in Artisans' Tools; Boots and Shoes; Cotton, Woollen, and Other Textiles; Fancy Articles; Fireworks and Matches; Glass; Musical Instruments and Materials; and Scientific Instruments and Appliances. In this class we include Fine Arts and Taxidermy, in which no change appears as to number of days in operation or number of persons employed but which shows a decrease in proportion of business done, in average yearly earnings, and a wider range of unemployment in 1891 than in 1890.

The following table presents industries of the third class:

INDUSTRIES.	INCREASE (+), OR DECREASE (-), IN 1891 AS COMPARED WITH 1890 IN —				
	Average Number of Days in Operation	Average Proportion of Business Done	Average Yearly Earnings	Average Number of Persons Employed	"Range"
Arms and ammunition, . . . . .	-1.20	+4.84	+17.59	+244	+159
Brick, tiles, and sewer pipe, . . . .	-1.69	+4.89	-11.93	+44	+91
Brooms, brushes, and mops, . . . .	-1.35	+2.86	+2.76	+28	-1
Buttons and dress trimmings, . . . .	-0.82	+2.64	+17.36	+127	-74
Cement, kaolin, lime, and plaster, . .	-4.22	+2.00	-16.35	-10	+3
Chemical preparations (compounded), .	-13.89	+3.00	+16.11	+12	+28
Drugs and medicines, . . . . .	-0.38	+2.89	-10.19	+55	+67
Glue, isinglass, and starch, . . . .	-33.43	+6.64	-17.60	+13	-113
Lumber, . . . . .	-11.53	+2.12	+28.98	+2	+146
Mixed textiles, . . . . .	-3.17	+4.84	+5.22	-36	-15
Railroad construction and equipment, .	-6.13	+0.29	-9.07	-42	+146
Shipbuilding, . . . . .	-3.02	+3.22	+36.43	-1	+133
Silk and silk goods, . . . . .	-2.87	+2.12	+13.95	-36	-265
Straw and palm leaf goods, . . . .	-15.34	+4.36	+35.48	+21	+158
Trunks and valises, . . . . .	-0.09	+6.43	+41.02	+4	-2

The foregoing industries are those which show a decline in the average number of days in operation but a greater average proportion of business done. Of these industries, the following show an increase in average yearly earnings: Arms and

Ammunition; Brooms, Brushes, and Mops; Buttons and Dress Trimmings; Chemical Preparations (Compounded); Lumber; Mixed Textiles; Shipbuilding; Silk and Silk Goods; Straw and Palm Leaf Goods; and Trunks and Valises; while Brick, Tiles, and Sewer Pipe; Cement, Kaolin, Lime, and Plaster; Drugs and Medicines; Glue, Isinglass, and Starch; and Railroad Construction and Equipment, show a decline in average yearly earnings.

The average number of persons employed is greater in all these industries except Cement, Kaolin, Lime, and Plaster; Mixed Textiles; Railroad Construction and Equipment; Shipbuilding; and Silk and Silk Goods. The range of unemployment is narrower in Brooms, Brushes, and Mops; Buttons and Dress Trimmings; Glue, Isinglass, and Starch; Mixed Textiles; Silk and Silk Goods; and Trunks and Valises, and wider in each of the other industries in this class.

The final table presents industries of the fourth class:

INDUSTRIES.	INCREASE (+), OR DECREASE (-), IN 1901 AS COMPARED WITH 1890 IN —				
	Average Number of Days in Operation	Average Proportion of Business Done	Average Yearly Earnings	Average Number of Persons Employed	"Range"
Agricultural implements, . . . . .	-8.04	-3.63	+21.66	-14	+34
Awnings, sails, tents, etc., . . . . .	-5.65	-1.70	+7.64	-6	+8
Boxes (paper and wooden), . . . . .	-3.02	-2.17	-1.72	-58	+93
Carriages and wagons, . . . . .	-3.67	-2.56	+20.11	+55	+313
Clocks, watches, and jewelry, . . . . .	-5.74	-2.40	+9.06	-28	+3
Clothing, . . . . .	-2.41	-2.63	+0.38	-81	+131
Corks, bungs, and taps, . . . . .	-6.62	-2.50	+21.16	-3	+4
Crayons, pencils, crucibles, etc., . . . . .	-5.38	-2.25	+84.26	-6	+6
Dyestuffs, . . . . .	-5.85	-6.00	+2.85	+1	+18
Earthen, plaster, and stone ware, . . . . .	-39.05	-1.25	+14.49	-6	+117
Fertilizers, . . . . .	-8.13	-0.71	+29.58	-9	+4
Flax, hemp, jute, and linen goods, . . . . .	-0.75	-1.13	+7.44	+22	-300
Furniture, . . . . .	-0.17	-1.69	+5.18	+123	-141
Ink, mucilage, and paste, . . . . .	-1.05	-2.25	-10.45	=	=
Leather, . . . . .	-4.62	-6.29	+7.79	-625	-561
Machines and machinery, . . . . .	-1.00	-1.73	+5.16	+411	+22
Oils and illuminating fluids, . . . . .	-0.17	-8.45	+22.60	+8	+12
Photographs and photographic materials, . . . . .	-1.42	-10.46	-7.47	-11	+2
Print works, dye works, and bleacheries, . . . . .	-2.01	-3.97	+10.92	-281	-62
Rubber and elastic goods, . . . . .	-7.14	-4.43	-20.89	+242	-733
Tallow, candles, soap, and grease, . . . . .	-2.11	-6.12	+22.27	-53	-138
Wooden goods, . . . . .	-1.88	-3.00	-7.56	+124	-80

\* No change.

Industries grouped in the above table are those which show a decrease in the average number of days in operation and also in the average proportion of business done. Notwithstanding these decreases, the following industries exhibit an increase in average yearly earnings: Agricultural Implements; Awnings, Sails, Tents, etc.; Carriages and Wagons; Clocks, Watches, and Jewelry; Clothing; Corks, Bungs, and Taps; Crayons, Pencils, Crucibles, etc.; Dyestuffs; Earthen, Plaster, and Stone Ware; Fertilizers; Flax, Hemp, Jute, and Linen Goods; Furniture; Leather; Machines and Machinery; Oils and Illuminating Fluids; Print Works, Dye Works, and Bleacheries; and Tallow, Candles, Soap, and Grease; while the only industries in this list which show a decrease in average yearly earnings are Boxes (Paper and Wooden); Ink, Mucilage, and Paste; Photographs and Photographic Materials; Rubber and Elastic Goods; and Wooden Goods.

In Ink, Mucilage, and Paste no change appears in the average number of persons employed nor in the range of unemployment. The average number of persons employed is greater in 1891 than in 1890 in Carriages and Wagons; Dyestuffs; Flax, Hemp, Jute, and Linen Goods; Furniture; Machines and Machinery; Oils and Illuminating Fluids; Rubber and Elastic Goods; and Wooden Goods; but it is less in each of the other industries of this class.

The range of unemployment is narrower in 1891 than in 1890 in Flax, Hemp, Jute, and Linen Goods; Furniture; Leather; Print Works, Dye Works, and Bleacheries; Rubber and Elastic Goods; Tallow, Candles, Soap, and Grease; and Wooden Goods, and wider in all the other industries in this class.

We next present for each of the industries a graphic comparison for 1890 and 1891 of the total amount of capital invested, value of goods made and work done, total amount of wages paid, and number of persons employed. An increase in any of these items is indicated by the sign (+), a decrease by the sign (—), and no change by the sign (=).

INDUSTRIES.	INCREASE (+), DECREASE (-), OR NO CHANGE (=), IN 1891 AS COMPARED WITH 1890 IN —			
	Amount of Capital Invested	Value of Goods Made and Work Done	Total Amount of Wages Paid	Average Number of Persons Employed
Agricultural implements, . . . .	—	—	+	—
Arms and ammunition, . . . .	—	+	+	+
Artisans' tools, . . . .	+	+	+	+
Awnings, sails, tants, etc., . . . .	+	—	—	—
Boots and shoes, . . . .	—	—	—	—
Boxes (paper and wooden), . . . .	+	+	—	—
Brick, tiles, and sewer pipe, . . . .	+	+	+	+
Brooms, brushes, and mops, . . . .	+	+	+	+
Burial cases, caskets, coffins, etc., . . . .	+	+	—	+
Buttons and dress trimmings, . . . .	+	+	+	+
Carpetings, . . . .	—	+	+	+
Carriages and wagons, . . . .	—	+	+	+
Cement, kaolin, lime, and plaster, . . . .	+	—	—	—
Chemical preparations (compounded), . . . .	+	—	+	+
Clocks, watches, and jewelry, . . . .	+	—	+	—
Clothing, . . . .	+	+	—	—
Cooking, lighting, and heating apparatus, . . . .	—	+	+	+
Cordage and twine, . . . .	+	—	+	+
Corks, bungs, and taps, . . . .	+	—	+	—
Cotton goods, . . . .	+	—	+	+
Cotton, woollen, and other textiles, . . . .	=	+	+	+
Crayons, pencils, crucibles, etc., . . . .	+	+	+	—
Drugs and medicines, . . . .	+	+	+	+
Dyestuffs, . . . .	—	—	+	+
Earthen, plaster, and stone ware, . . . .	—	+	+	—
Electrical apparatus and appliances, . . . .	—	—	+	+
Electroplating, . . . .	=	+	+	+
Emery and sand paper and cloth, etc., . . . .	—	+	+	+
Fancy articles, . . . .	—	+	—	—
Fertilizers, . . . .	—	—	—	—
Fine arts and taxidermy, . . . .	—	+	—	=
Fireworks and matches, . . . .	+	+	+	+
Flax, hemp, jute, and linen goods, . . . .	+	—	+	+
Food preparations, . . . .	+	+	+	+
Furniture, . . . .	—	+	+	+
Glass, . . . .	+	+	+	+
Glue, isinglass, and starch, . . . .	—	—	—	+
Hair work (animal and human), . . . .	—	+	—	—

INDUSTRIES.	INCREASE (+), DECREASE (-), OR NO CHANGE (=), IN 1891 AS COMPARED WITH 1890 IN —			
	Amount of Capital Invested	Value of Goods Made and Work Done	Total Amount of Wages Paid	Average Number of Persons Employed
Hose: rubber, linen, etc., . . . .	+	+	+	+
Hosiery and knit goods, . . . .	+	+	+	+
Ink, mucilage, and paste, . . . .	+	+	—	=
Ivory, bone, shell, and horn goods, etc.,	+	+	+	+
Leather, . . . . .	—	—	—	—
Liquors and beverages (not spirituous),	+	+	—	+
Liquors: malt, distilled, and fermented,	+	+	+	+
Lumber, . . . . .	+	+	+	+
Machines and machinery, . . . .	+	—	+	+
Metals and metallic goods, . . . .	+	+	+	+
Mixed textiles, . . . . .	+	—	—	—
Models and patterns, . . . . .	+	+	—	+
Musical instruments and materials, .	+	—	—	—
Oils and illuminating fluids, . . . .	+	+	+	+
Paints, colors, and crude chemicals, .	+	—	+	—
Paper and paper goods, . . . . .	+	+	+	+
Perfumes, toilet articles, etc., . . .	+	+	+	+
Photographs and photographic materials,	—	—	—	—
Polishes and dressing, . . . . .	—	+	+	—
Printing, publishing, and bookbinding, .	+	—	+	+
Print works, dye works, and bleacheries,	—	—	—	—
Railroad construction and equipment, .	+	+	—	—
Rubber and elastic goods, . . . . .	+	+	—	+
Scientific instruments and appliances, .	+	+	+	+
Shipbuilding, . . . . .	—	+	+	—
Silk and silk goods, . . . . .	—	+	+	—
Sporting and athletic goods, . . . .	+	+	+	+
Stone, . . . . .	—	+	+	+
Straw and palm leaf goods, . . . . .	—	+	+	+
Tallow, candles, soap, and grease, .	+	—	—	—
Tobacco, snuff, and cigars, . . . .	+	+	+	+
Toys and games (children's), . . . .	+	+	+	+
Trunks and valises, . . . . .	+	+	+	+
Whips, lashes, and stocks, . . . . .	+	+	+	+
Wooden goods, . . . . .	+	+	+	+
Woollen goods, . . . . .	—	+	+	+
Worsted goods, . . . . .	—	+	+	+
ALL INDUSTRIES, . . . . .	+	+	+	+

Referring to the last line of this table we note an increase in the amount of capital invested, value of goods made and work done, total amount of wages paid, and in average number of persons employed, for All Industries in the aggregate ; also in the following specified industries :

Artisans' Tools.	Lumber.
Brick, Tiles, and Sewer Pipe.	Metals and Metallic Goods.
Brooms, Brushes, and Mops.	Oils and Illuminating Fluids.
Buttons and Dress Trimmings.	Paper and Paper Goods.
Drugs and Medicines.	Perfumes, Toilet Articles, etc.
Fireworks and Matches.	Scientific Instruments and Appliances.
Food Preparations.	Sporting and Athletic Goods.
Glass.	Tobacco, Snuff, and Cigars.
Hose: Rubber, Linen, etc.	Toys and Games (Children's).
Hosiery and Knit Goods.	Trunks and Valises.
Ivory, Bone, Shell, and Horn Goods, etc.	Whips, Lashes, and Stocks.
Liquors: Malt, Distilled, and Fermented.	Wooden Goods.

The following industries show a decline in each of the elements named :

Boots and Shoes.	Photographs and Photographic Materials.
Fertilizers.	Print Works, Dye Works, and Bleacheries.
Leather.	

The following industries increased the value of goods made and work done, the total amount of wages paid, and the average number of persons employed, but exhibit a decrease in the amount of capital invested :

Arms and Ammunition	Furniture.
Carpetings.	Stone.
Carriages and Wagons.	Straw and Palm Leaf Goods.
Cooking, Lighting, and Heating Apparatus.	Woollen Goods.
Emery and Sand Paper and Cloth, etc.	Worsted Goods.

Cotton, Woollen, and Other Textiles and Electroplating show no change in amount of capital invested but exhibit an increase in each of the other items.

The following industries exhibit an increase in the amount of capital invested but a decline in value of goods made, in total amount of wages paid, and in average number of persons employed:

Awnings, Sails, Tents, etc.	Musical Instruments and Materials.
Cement, Kaolin, Lime, and Plaster.	Tallow, Candles, Soap, and Grease.
Mixed Textiles.	

An increase in the total amount of wages paid but a decrease in the amount of capital invested, in value of goods made and work done, and in average number of persons employed, appears in Agricultural Implements.

In the following condensed summary drawn from the various detailed tables for the years 1890 and 1891 the leading items relative to All Industries, with percentages of increase or decrease, are brought directly before the reader:

CLASSIFICATION.	1890	1891	INCREASE (+), OR DECREASE (-), IN 1891	
			Amounts	Percent- ages
Number of private firms, . . . .	2,987	2,952	-35	-1.17
Number of corporations, . . . .	730	762	+32	+4.38
Number of partners, . . . .	4,909	4,824	-85	-1.73
Number of stockholders, . . . .	35,425	37,627	+2,202	+6.22
Amount of capital invested, . . . .	\$424,723,812	\$434,656,302	+\$9,932,490	+2.34
Value of stock used, . . . .	\$352,435,774	\$362,210,369	+\$9,774,595	+2.77
Value of goods made and work done, . .	\$605,032,664	\$613,100,717	+\$8,068,053	+1.33
Persons employed.				
Average number, . . . .	287,900	292,866	+4,966	+1.72
Smallest number, . . . .	251,107	258,771	+7,664	+3.05
Greatest number, . . . .	322,288	329,634	+7,346	+2.28
Excess of greatest over smallest number, . . . .	71,181	70,863	-318	-0.45
Total amount paid in wages, . . . .	\$126,080,303	\$129,416,248	+\$3,335,945	+2.65
Average yearly earnings, . . . .	\$437.93	\$441.90	+\$3.97	+0.91
Average proportion of business done, .	70.27	69.27	-1.00	-1.42
Average number of days in operation, .	295.44	296.71	+1.27	+0.43

The slight changes in each of the elements summarized in the foregoing table, when reduced to the basis of percentages, will be at once apparent. These slight changes, of course, indicate that with respect to nearly every element surrounding production, the condition of the industries in the aggregate was

substantially the same in each year. The greatest percentages of difference appear in the number of corporations and stockholders. The increase in the number of corporations is 32, or 4.38 per cent. This increase, it will be remembered, exhibits a change in the status of the establishments in 1891 as compared with 1890 inasmuch as the returns are from the same concerns in each year. The number of stockholders increased 6.22 per cent, mainly on account of the change in establishments from the private firm to the corporate basis. The amount of capital invested in all the establishments was 2.34 per cent greater in 1891 than in 1890; the value of stock used 2.77 per cent greater; and the value of goods made and work done only 1.33 per cent greater. The average number of persons employed was but 1.72 per cent greater, while the total amount of wages paid was 2.65 per cent greater. The average yearly earnings were 0.91 per cent greater; and the average proportion of business done, based upon the ultimate productive capacity of the establishments, was 1.42 per cent less.

It has been customary in these reports each year to present tables showing the actual product per \$1,000 of capital invested in certain leading industries, also the average product per employé, the percentage of industry product paid in wages, and the percentage devoted to other expenses. Such a table follows for 1891:



	INDUSTRIES	Number of Estab- lishments Con- sidered	Amount of Capital Invested	Average Number of Persons Employed
1	Boots and shoes, . . . . .	567	\$27,507,315	43,343
2	Carpetings, . . . . .	12	7,687,708	4,672
3	Cotton goods, . . . . .	157	117,933,102	71,960
4	Leather, . . . . .	154	8,212,735	5,512
5	Machines and machinery, . . . . .	263	26,627,625	16,120
6	Metals and metallic goods, . . . . .	277	25,805,602	17,373
7	Paper and paper goods, . . . . .	102	22,556,155	9,873
8	Woollen goods, . . . . .	138	27,335,204	17,479
9	Worsted goods, . . . . .	21	10,782,298	7,965

Before considering the results of the foregoing table it is proper to explain certain designations used in it. By "Industry Product" is meant the actual result of the productive forces in the industry, that is, the added value created above the value of stock and materials consumed. The values presented in this and the following tables under the designation "Industry Product," are obtained by deducting from the total value of goods made in each of the specified industries, the value of stock used; the difference being the added value or actual product due to the industry. In the division of the proceeds of each industry, one part of this industry product is paid to the labor force in the form of wages, this being labor's share of the product. The balance constitutes a fund from which are paid freights, insurance, interest on loans (credit capital), interest on stock (fixed or invested capital), rents, commissions, salaries, etc.; in fact, all expenses other than those for stock and wages. The remainder, if any, is the profit of the employer. The entire balance of the industry product remaining after the deduction of the amount paid in wages, becomes a "Profit and Minor Expense Fund,"—and is thus designated in the table. Of course, it will be understood that the term "Minor Expense" is relative. The expenses, some of which we have enumerated, paid out of this balance, are in themselves considerable in amount, and are only to be classed as "Minor" in comparison with the generally larger amounts expended for materials (stock), and wages.

Referring to the table we find the largest industry product per \$1,000 of capital in Boots and Shoes, thus confirming the

Total Amount Paid in Wages During the Year	Industry Product	Profit and Minor Expense Fund	INDUSTRY PRODUCT		PERCENTAGE OF INDUSTRY PRODUCT		
			Per \$1,000 of Capital	Average per Employé	Devoted to Profit and Minor Expenses	Paid in Wages	
\$21,861,711	\$36,609,613	\$14,747,902	\$1,330.90	\$844.65	40.28	59.72	1
1,753,899	3,845,161	2,091,262	500.17	823.02	54.39	45.61	2
24,738,663	37,604,125	12,866,472	318.86	525.57	34.21	65.79	3
2,867,027	5,166,581	2,298,554	628.97	937.15	44.50	55.50	4
8,962,322	16,005,615	7,043,293	601.09	992.90	44.01	55.99	5
8,829,038	16,547,373	7,718,335	641.23	952.48	46.64	53.36	6
4,233,548	10,122,866	5,889,308	448.78	1,025.31	58.18	41.82	7
6,616,442	12,826,986	6,210,544	460.82	733.85	48.42	51.58	8
2,973,680	4,998,334	2,024,654	463.57	627.54	40.51	59.49	9

experience of former years, this product amounting in 1891 to \$1,330.90. Next to this industry come Metals and Metallic Goods, Leather, and Machines and Machinery, in order as named, their respective industry products per \$1,000 of capital being \$641.23, \$628.97, and \$601.09. In comparison with each other these industries rank close together in a definitely marked group. Another such group comprises Worsted Goods, Woollen Goods and Paper and Paper Goods, ranking in order as named, with industry products per \$1,000 of capital amounting to \$463.57, \$460.82, and \$448.78, respectively. Between the two groups mentioned is Carpetings, its industry product per \$1,000 of capital being \$500.17, and following them we find Cotton Goods, with \$318.86, the smallest industry product per \$1,000 of capital, of any in the selected list.

The comparison we have just made illustrates the efficiency of capital in the industries named. To determine the relative efficiency of labor the industries may be compared as to the average value of the industry product per employé. In such a comparison Paper and Paper Goods stands first with an average industry product per employé of \$1,025.31. It is closely approached by Machines and Machinery, in which an average of \$992.90 appears. Following in order as named, we find, with averages as specified, Metals and Metallic Goods, \$952.48, Leather, \$937.15, and Boots and Shoes, \$844.65. Next to these comes Carpetings with an average of \$823.02. Closing the list the following group is noted: Woollen Goods, \$733.85, Worsted Goods, \$627.54, and Cotton Goods, \$522.57.

Cotton Goods this year ranks at the head of this list of

selected industries with respect to the percentage of industry product paid in wages, this percentage being 65.79. Ranking close together below this industry, in order as named, are the following, with the annexed percentages: Boots and Shoes, 59.72; Worsted Goods, 59.49; Machines and Machinery, 55.99; Leather, 55.50; Metals and Metallic Goods, 53.36, and Woollen Goods, 51.58. Lowest in this comparison are Carpetings, 45.61, and Paper and Paper Goods, 41.82.

The percentage of industry product paid in wages together with that devoted to profit and minor expenses constitutes 100 per cent, these two items making up the whole of the industry product. The rank of the industries with respect to the percentage of industry product devoted to profit and minor expenses is therefore exactly the reverse of their rank in the comparison as to the percentage paid in wages.

It is interesting to parallel the rank of the different industries for 1891, as regards amount of industry product per \$1,000 of capital, with their rank in 1890 as derived from the report of that year.

1890.	1891.
Boots and Shoes.	Boots and Shoes.
Metals and Metallic Goods.	Metals and Metallic Goods.
Leather.	Leather.
Machines and Machinery.	Machines and Machinery.
Paper and Paper Goods.	Carpetings.
Worsted Goods	Worsted Goods.
Woollen Goods.	Woollen Goods.
Carpetings.	Paper and Paper Goods.
Cotton Goods.	Cotton Goods.

From the above text-table the changes in rank in 1891 as compared with 1890 may be readily seen. A similar parallel as to average industry product per employé follows:

1890.	1891.
Paper and Paper Goods.	Paper and Paper Goods.
Metals and Metallic Goods.	Machines and Machinery.
Machines and Machinery.	Metals and Metallic Goods.
Leather.	Leather.
Boots and Shoes.	Boots and Shoes.
Woollen Goods.	Carpetings.
Worsted Goods.	Woollen Goods.
Carpetings.	Worsted Goods.
Cotton Goods.	Cotton Goods.

With respect to the percentage of industry product paid in wages, the industries ranked as follows :

1890.	1891.
Boots and Shoes.	Cotton Goods
Cotton Goods.	Boots and Shoes.
Carpetings.	Worsted Goods.
Worsted Goods.	Machines and Machinery.
Leather.	Leather.
Machines and Machinery.	Metals and Metallic Goods.
Metals and Metallic Goods.	Woollen Goods.
Woollen Goods.	Carpetings.
Paper and Paper Goods.	Paper and Paper Goods

The only industry in this selected list which retains the same rank in these comparisons in each year is Leather, which ranks third as to industry product per \$1,000 of capital, fourth as to average industry product per employé, and fifth as to the percentage of industry product paid in wages. Cotton Goods retains the same position in each year as to product per \$1,000 of capital and average product per employé, its rank being lowest in each case, but with respect to the percentage of industry product paid in wages, it changes places with Boots and Shoes in 1891 rising to first place instead of standing second as in 1890.

Separate industry presentations for the nine leading industries included in the last table permit comparisons for the years 1891 and 1890. The first relates to Boots and Shoes.

*Boots and Shoes.* [Comparisons for 567 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$27,790,899	\$27,507,315
Value of goods made and work done (gross product), . . . . .	\$90,550,454	\$89,229,603
Value of stock used and other materials consumed in production, . . . . .	\$54,441,633	\$52,619,990
Industry product (gross product less value of stock and materials), . . . . .	\$36,108,821	\$36,609,613
Wages (labor's direct share of product), . . . . .	\$22,714,532	\$21,861,711
Profit and minor expense fund (industry product less wages), . . . . .	\$13,394,289	\$14,747,902
Percentage of industry product paid in wages, . . . . .	62.91	59.72
Percentage of industry product devoted to profit and minor expenses, . . . . .	37.09	40.28
Percentage of profit and minor expense fund of capital invested, . . . . .	48.20	53.61

The percentage of industry product paid in wages was somewhat smaller in 1891 than in 1890, being 59.72 as against 62.91. The percentages of industry product devoted to profit and minor expenses were 37.09 and 40.28 in 1890 and 1891, respectively, indicating that, cost of stock and wages being eliminated, a larger margin remained for the payment of other expenses and for profit in 1891 than in 1890. This margin formed 48.20 per cent of capital in 1890 and 53.61 per cent in 1891.

The following table presents a similar comparison for Carpetings:

*Carpetings.* [Comparisons for 12 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$7,905,635	\$7,687,708
Value of goods made and work done (gross product), . . . . .	\$7,731,055	\$8,967,614
Value of stock used and other materials consumed in production, . . . . .	\$4,831,720	\$5,122,453
Industry product (gross product less value of stock and materials), . . . . .	\$2,899,335	\$3,845,161
Wages (labor's direct share of product), . . . . .	\$1,691,949	\$1,753,899
Profit and minor expense fund (industry product less wages), . . . . .	\$1,207,386	\$2,091,262
Percentage of industry product paid in wages, . . . . .	58.36	45.61
Percentage of industry product devoted to profit and minor expenses, . . . . .	41.64	54.39
Percentage of profit and minor expense fund of capital invested, . . . . .	15.27	27.20

Taking, as before, the percentage of industry product paid in wages we find a material decrease in 1891 as compared with 1890, the percentages being 45.61 and 58.36, respectively. Of course this leaves a larger margin for expenses and profit in 1891, the percentage being 54.39 as against 41.64 in 1890. As capital also decreased in the industry this profit and expense fund constitutes a larger percentage of capital invested it being 27.20 in 1891 as against 15.27 in 1890.

The next table relates to Cotton Goods.

*Cotton Goods.* [Comparisons for 157 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$114,947,374	\$117,933,102
Value of goods made and work done (gross product), . . . . .	\$90,063,203	\$89,857,630
Value of stock used and other materials consumed in production, . . . . .	\$52,290,260	\$52,253,505
Industry product (gross product less value of stock and materials), . . . . .	\$37,772,943	\$37,604,125
Wages (labor's direct share of product), . . . . .	\$23,634,881	\$24,738,653
Profit and minor expense fund (industry product less wages), . . . . .	\$14,138,062	\$12,865,472
Percentage of industry product paid in wages, . . . . .	62.57	65.79
Percentage of industry product devoted to profit and minor expenses, . . . . .	37.43	34.21
Percentage of profit and minor expense fund of capital invested, . . . . .	12.30	10.91

The percentage of industry product paid in wages in this industry increased from 62.57 in 1890 to 65.79 in 1891; the percentage devoted to other expenses and to profit correspondingly declined from 37.43 to 34.21; in 1891 this fund constituted 10.91 per cent of capital invested as against 12.30 per cent in 1890.

The presentation for Leather follows:

*Leather.* [Comparisons for 154 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$9,039,011	\$8,212,735
Value of goods made and work done (gross product), . . . . .	\$20,122,480	\$17,090,803
Value of stock used and other materials consumed in production, . . . . .	\$13,959,611	\$11,925,222
Industry product (gross product less value of stock and materials), . . . . .	\$6,162,869	\$5,165,581
Wages (labor's direct share of product), . . . . .	\$3,144,285	\$2,867,027
Profit and minor expense fund (industry product less wages), . . . . .	\$3,018,584	\$2,298,554
Percentage of industry product paid in wages, . . . . .	51.02	55.50
Percentage of industry product devoted to profit and minor expenses, . . . . .	48.98	44.50
Percentage of profit and minor expense fund of capital invested, . . . . .	33.40	27.99

In this industry, the percentages of industry product paid in wages were 55.50 in 1891 and 51.02 in 1890. The percentage of industry product devoted to profit and minor expenses is 44.50 in 1891 as against 48.98 in 1890. In 1891 the profit

and minor expense fund constituted 27.99 per cent of capital invested, as against 33.40 per cent in 1890.

The facts for Machines and Machinery next appear.

*Machines and Machinery.* [Comparisons for 263 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$24,537,451	\$26,627,625
Value of goods made and work done (gross product), . . . . .	\$25,212,841	\$24,876,466
Value of stock used and other materials consumed in production, . . . . .	\$9,309,620	\$8,870,851
Industry product (gross product less value of stock and materials), . . . . .	\$15,903,221	\$16,005,615
Wages (labor's direct share of product), . . . . .	\$8,652,828	\$8,962,322
Profit and minor expense fund (industry product less wages), . . . . .	\$7,250,393	\$7,043,293
Percentage of industry product paid in wages, . . . . .	54.41	55.99
Percentage of industry product devoted to profit and minor expenses, . . . . .	45.59	44.01
Percentage of profit and minor expense fund of capital invested, . . . . .	29.55	26.45

Again we note an increase in the percentage of industry product paid in wages, the advance being from 54.41 in 1890 to 55.99 in 1891. The percentage devoted to profit and minor expenses declines from 45.59 to 44.01. In 1891 this profit and minor expense fund was 26.45 per cent of capital while in 1890 it amounted to 29.55 per cent.

The next table relates to Metals and Metallic Goods.

*Metals and Metallic Goods.* [Comparisons for 277 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$23,617,954	\$25,805,602
Value of goods made and work done (gross product), . . . . .	\$34,124,906	\$34,198,526
Value of stock used and other materials consumed in production, . . . . .	\$17,926,860	\$17,651,153
Industry product (gross product less value of stock and materials), . . . . .	\$16,198,046	\$16,547,373
Wages (labor's direct share of product), . . . . .	\$8,548,999	\$8,829,038
Profit and minor expense fund (industry product less wages), . . . . .	\$7,649,047	\$7,718,335
Percentage of industry product paid in wages, . . . . .	52.78	53.36
Percentage of industry product devoted to profit and minor expenses, . . . . .	47.22	46.64
Percentage of profit and minor expense fund of capital invested, . . . . .	32.39	29.91

As noted in the preceding industry, the percentage of industry product going to labor in the form of wages exhibits an increase in 1891, this percentage being 53.36 while in 1890 it was 52.78. The fund remaining for the payment of other expenses and for profits declines from 47.22 per cent of the industry product in 1890 to 46.64 per cent in 1891. As capital was increased in 1891 this fund was 29.91 per cent of capital invested in that year as against 32.39 per cent in 1890.

We next introduce a table relating to Paper and Paper Goods.

*Paper and Paper Goods.* [Comparisons for 102 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$22,120,916	\$22,556,155
Value of goods made and work done (gross product), . . . . .	\$25,219,222	\$25,803,660
Value of stock used and other materials consumed in production, . . . . .	\$14,609,690	\$15,680,804
Industry product (gross product less value of stock and materials), . . . . .	\$10,609,532	\$10,122,856
Wages (labor's direct share of product), . . . . .	\$4,043,522	\$4,233,548
Profit and minor expense fund (industry product less wages), . . . . .	\$6,566,010	\$5,889,308
Percentage of industry product paid in wages, . . . . .	38.11	41.82
Percentage of industry product devoted to profit and minor expenses, . . . . .	61.89	58.18
Percentage of profit and minor expense fund of capital invested, . . . . .	29.68	26.11

Here again we find an increase in the percentage of industry product paid in wages in 1891, necessarily accompanied by a decline in the portion remaining for the payment of other expenses and for profit. Capital is slightly increased. The profit and minor expense fund constitutes a smaller percentage of capital invested in 1891 than in 1890. The percentages are as follows: 41.82 per cent of industry product was paid in wages in 1891 as against 38.11 per cent in 1890; the percentage devoted to the profit and minor expense fund was 58.18 as against 61.89, and this fund was 26.11 per cent of capital in 1891, while in 1890 it was 29.68 per cent of capital invested.

The next table relates to Woollen Goods.



*Woollen Goods.* [Comparisons for 138 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$28,271,436	\$27,835,204
Value of goods made and work done (gross product), . . . . .	\$31,151,139	\$33,989,359
Value of stock used and other materials consumed in production, . . . . .	\$19,461,068	\$21,162,373
Industry product (gross product less value of stock and materials), . . . . .	\$11,690,071	\$12,826,986
Wages (labor's direct share of product), . . . . .	\$6,174,770	\$6,616,442
Profit and minor expense fund (industry product less wages), . . . . .	\$5,515,301	\$6,210,544
Percentage of industry product paid in wages, . . . . .	52.82	51.58
Percentage of industry product devoted to profit and minor expenses, . . . . .	47.18	48.42
Percentage of profit and minor expense fund of capital invested, . . . . .	19.51	22.31

In this industry a slight decline is noted in the percentage of industry product paid in wages, the percentages being 52.82 in 1890 and 51.58 in 1891. The change is very slight, and the percentages represent practically the same conditions in each year. The fluctuation is reflected in the percentage of industry product devoted to profit and minor expense, which becomes 48.42 in 1891 as against 47.18 in 1890. Less capital is returned in 1891 than in 1890. The percentage which the profit and minor expense fund represented of capital invested was 22.31 in 1891, while in 1890 it was 19.51.

The final table presents the facts as to Worsted Goods.

*Worsted Goods.* [Comparisons for 21 Establishments.]

CLASSIFICATION.	1890	1891
Amount of capital invested, . . . . .	\$10,912,129	\$10,782,298
Value of goods made and work done (gross product), . . . . .	\$15,350,196	\$17,219,318
Value of stock used and other materials consumed in production, . . . . .	\$10,448,643	\$12,220,984
Industry product (gross product less value of stock and materials), . . . . .	\$4,901,553	\$4,998,334
Wages (labor's direct share of product), . . . . .	\$2,927,448	\$2,973,680
Profit and minor expense fund (industry product less wages), . . . . .	\$1,974,105	\$2,024,654
Percentage of industry product paid in wages, . . . . .	59.72	59.49
Percentage of industry product devoted to profit and minor expenses, . . . . .	40.28	40.51
Percentage of profit and minor expense fund of capital invested, . . . . .	18.09	18.78

This industry exhibits greater uniformity than any of the others which have been presented. The percentage of industry product paid in wages was 59.49 in 1891, while in 1890 it was 59.72. The percentages devoted to profit and minor expenses were 40.51 and 40.28 in 1891 and 1890, respectively, and the profit and minor expense fund constituted 18.78 per cent of capital invested in 1891 as against 18.09 per cent in 1890.

The returns permit the following condensed general statements as regards the years 1890 and 1891, for the 3,745 establishments:

#### CAPITAL INVESTED.

*The increase in capital devoted to production in 1891 as compared with 1890 amounted to 2.34 per cent. In Cotton Goods the increase was 2.60 per cent; in Machines and Machinery, Metals and Metallic Goods, Musical Instruments and Materials, and Paper and Paper Goods the percentages of increase were 8.52, 9.26, 5.48, and 1.97, respectively. In the establishments returned in Boots and Shoes, Carpetings, Leather, Woollen Goods, and Worsted Goods, on the other hand, slight decreases are reported, the percentages of decrease being 1.02, 2.76, 9.14, 1.54, and 1.19, respectively. In the ten leading industries is invested 64.33 per cent of all the capital returned in 1891 and in them is found 59.64 per cent of the industrial capital of the Commonwealth, as returned in the Decennial Census of 1885.*

#### STOCK USED.

*The increase in the value of stock used amounted to 2.77 per cent. In Carpetings, Paper and Paper Goods, Woollen Goods, and Worsted Goods the percentages of increase were 6.02, 7.33, 8.74, and 16.96, respectively. In the six other leading industries the value of stock used in 1891 was less than in 1890, the percentages of decrease being as follows: Boots and Shoes, 3.35; Cotton Goods, 0.07; Leather, 14.57; Machines and Machinery, 4.71; Metals and Metallic Goods, 1.54; Musical Instruments and Materials, 4.58. The value of stock used constituted 58.25 per cent of the aggregate value*

of product in 1890 and 59.08 per cent of the aggregate value of product in 1891.

#### GOODS MADE.

The increase in the value of goods made amounted to 1.33 per cent. With respect to the ten leading industries, a smaller product value for the year 1891 as compared with 1890 appears in Boots and Shoes, the decrease being 1.46 per cent; also in Cotton Goods, 0.23 per cent; in Leather, 15.07 per cent; in Machines and Machinery, 1.33 per cent; and in Musical Instruments and Materials, 4.55 per cent. On the contrary, a gain is noted in Carpetings of 15.99 per cent; in Paper and Paper Goods, 2.32 per cent; in Metals and Metallic Goods, 0.22 per cent; in Woollen Goods, 9.11 per cent; and in Worsted Goods, 12.18 per cent. The changes above noted are not very material except in Carpetings, Woollen Goods, and Worsted Goods in which the percentages of increase in output are considerable. In Leather the product value shows an equally sharp decline for the year. In the ten industries named is found 56.53 per cent of the entire product returned in 1891. These industries turned out 50.80 per cent of the entire product of the State as returned in the Decennial Census of 1885.

#### PERSONS EMPLOYED.

In 1890 the average number of persons employed in all the establishments represented was 287,900 and the average number of persons employed in the same establishments in 1891 was 292,866. This is an increase of 1.72 per cent in the average number employed. The number of persons employed at the periods of employment of greatest number was 322,288 in 1890 and 329,634 in 1891, showing an increase of 2.28 per cent; while the number employed at the periods of employment of smallest number in 1890 was 251,107 and in 1891 258,771, showing an increase of 3.05 per cent. The range of unemployment was slightly less in 1891 than in 1890, the number unemployed at some period of longer or shorter duration being 70,863 in 1891 as against 71,181 in 1890, a decrease of 0.45 per cent. In the ten principal industries previously mentioned a greater average number of persons was employed in 1891 than in 1890 except in Boots and Shoes and Leather,

*which exhibit a smaller average number employed; but the increases or decreases in the averages are comparatively slight.*

#### WAGES PAID.

*The total amount paid in wages in the establishments represented in the 75 industries considered increased 2.65 per cent. In Carpetings the increase was 3.66 per cent; in Cotton Goods, 4.67 per cent; in Machines and Machinery, 3.58 per cent; in Metals and Metallic Goods, 3.28 per cent; in Paper and Paper Goods, 4.70 per cent; and in Woollen Goods and Worsted Goods, 7.15 per cent and 1.58 per cent, respectively. In Boots and Shoes, however, the total amount paid in wages decreased 3.75 per cent and in Leather, 8.82 per cent. The average yearly earnings per individual, without regard to sex or age, employed in the 75 industries, were \$437.93 in 1890 and \$441.90 in 1891, an increase of 0.91 per cent. The range from highest to lowest average yearly earnings was from \$676.35 to \$278.93 in 1890 and from \$687.76 to \$287.22 in 1891. The higher earnings ruled in the industries demanding greater skill and employing males chiefly and the lower in factory industries employing a large proportion of females and young persons.*

#### PROPORTION OF BUSINESS DONE.

*The average proportion of business done reached 70.27 per cent in 1890 and 69.27 per cent in 1891, of the full productive capacity of the 3,745 establishments compared.*



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# INDUSTRIAL CHRONOLOGY.

1891.



## INDUSTRIAL CHRONOLOGY—1891.

**Adams.** In January, Renfrew Manufacturing Co. started up looms which had been idle for past year. — Picker room of Plunkett Twine Mill damaged by fire. — Zylonite works closed; 700 persons out of employment; cause, consolidation with other establishments in the industry and removal from State. *February.* Negotiations proposed for location of shirt and collar factory at vacant zylonite works. *March.* The upper weave mill of the Renfrew Manufacturing Co. destroyed by fire. *May.* Adams Bros. Manufacturing Co. incorporated; capital \$40,000. — New wheel put in by Renfrew Manufacturing Co. *June.* Renfrew Mills shut down indefinitely: slack trade. *July.* Adams Bros. began construction of new dye-house. — Renfrew Manufacturing Co. started up on full time. — Shaw, Osborne, & Co. leased Allen Iron Works. — Linnett Manufacturing Co. of Newark, N. J., offered to locate shirt manufactory here provided town would build shop, boiler house, etc., at a cost not to exceed \$6,000, company to occupy the same rent free for five years, at end of which time to have privilege of buying or leasing buildings at a rental of seven per cent on the cost. — The seven set fancy cassimere mill of B. F. Phillips & Sons shut down. *August.* Linnett Manufacturing Co. held meeting, elected officers, and decided on new factory to be 50 x 100 feet, work on which began in September. *October.* New woodworking mill, 24 x 40 feet, two stories high, begun for Eli Reeves. — L. L. Brown paper mill shut down owing to break in gearing. *December.* Stockholders of Berkshire Cotton Manufacturing Co. voted to increase capital stock to \$1,000,000 and to build new mill, 340 x 100 feet, four stories high, to contain 40,000 spindles. — A 35 horse power engine and 50 horse power boiler put in new plant of Linnett Manufacturing Co.

**Amesbury.** In January, reported that carriage shipments for 1890 were larger than any previous year. Total number shipped by rail, 18,789. — Kendall, Lunt, & Co. increased plant and added manufacture of wheels; ten more men employed. — Rand & Bryant added manufacture of express wagons to other vehicles. *February.* Factory of A. N. Parry & Co., carriages, sold at auction. *March.* Merrimac Hat Co. shut down for repairs. *April.* Hamilton Woollen Co.'s mill shut down for repairs. — Power pulleys at Atwood Bros.' factory broke, delaying work. *May.* Colchester Mills incorporated to manufacture cotton goods. *September.* All mills of Hamilton Woollen Co. shut down owing to break in Mill No. 4. *October.* S. R. Bailey Co. made additions to factory. — D. J. Marston established manufacture of carriage hub blocks, using an automatic machine of his own invention. — Merrimac Hat Co. increased force to 400 employés. — Locke & Jewell, carriages, and C. F. Pettingill, machine shop, damaged by fire. *November.* Nathan D. Dodge & Son Co., shoes, occupied the A. N. Parry factory, which had been refitted. — Fowler & Heal, known as Eureka Seat Spindle Co., removed from Newfield, Me., in October and began manufacture of spindles; factory running night and day. — New saw mill of A. W. Bartlett started up and sawed its first logs; mill capacity, 20,000 feet per day. *December.* Merrimac Hat Co. shut down for holidays.

**Amherst.** In February, leather-board mill of A. R. Cushman totally destroyed by fire. *April.* The Hills Co.'s hat factory ran nights. *May.* Leather-board mill of A. R. Cushman rebuilt with one-third greater capacity and started up. *June.* The Hills Co.'s hat factory closed temporarily. *October.* Carriage shop of A. W. Hall destroyed by fire.

**Andover.** In February, shops of Craighead & Kintz Manufacturing Co. lighted by electricity furnished by its own plant for the first time. *March.* Finishing room of Stevens Woollen Mill put on half time. *December.* Buzzell Hosiery Mill shut down indefinitely. — C. H. Ingalls withdrew from firm of W. C. Donald & Co. — W. H. Swift, Boston, purchased color and chemical business of W. C. Donald & Co.



**Ashland.** In March, T. M. Foote Regulator Co. leased factory and put in machinery to manufacture its own goods, these having previously been made by others under contract. *June.* Albert L. Coolidge, of Houghton, Coolidge, & Co., shoes, died, aged 59 years. *August.* T. A. Whitcher & Co., Quincy, leased factory of Houghton, Coolidge, & Co. to be occupied January, 1892. *September.* T. M. Foote Regulator Co. shut down indefinitely.

**Athol.** In February, A. F. Tyler purchased frame department of Kennebec (Me.) Frame & Lumber Co. and moved machinery to new addition. — Athol Co-operative Furniture Co., organized 1879, sold its business, plant, and stock and petitioned to be dissolved. Actual business ended in 1889. *May.* Hapgood & Smith shut down temporarily while an addition to factory was being built. Seven match machines to be in operation. — Storehouse and mill of Stratton Bros. & Co. destroyed by fire. *July.* New building of Stratton Bros. & Co. finished and occupied. *September.* Cheney cotton batting mill leased to Goddard & Manning. *November.* Carpenters' Lumber Co., incorporated under Maine laws, organized for purchase of Cheney mill property, to manufacture patent roofing and other specialties. — Millers River Manufacturing Co. built one-story structure, 30 x 50 feet, for sewing room and storage purposes.

**Attleborough.** In January, fire occurred in packing room of Tappan, Berry, & Co.'s jewelry factory. *February.* Attleborough Gas Co. introduced new apparatus for manufacture of wood and oil gas, being the first in New England. *March.* New concern called Co-operative Manufacturing Jewellers organized for manufacture of novelties in plate and silver. — Hebron Manufacturing Co. changed work in weaving room from plain sheeting to three and five harness twill goods, and put in new plant of cotton openers and pickers. *April.* Dodgeville cotton mills introduced new system of picking and five new speeders, also lengthened out mules, and put in new boilers. *October.* Mossberg Manufacturing Co. began manufacture of thread winding machines in June, completing specimens this month. *November.* Wm. Coupe & Co. enlarged plant for manufacture of leather belting. *December.* Foster & Nightingale's Mechanics Mill nearly destroyed by fire.

**Avon.** In January, Ephraim W. Littlefield, retired shoe manufacturer, died, aged 71 years. He began manufacturing shoes in 1857. *May.* L. G. Littlefield's shoe factory closed for two weeks, starting up again June 2. *November.* Geo. H. Burt & Co., shoes, shut down one week for inventory.

**Ayer.** In February, factory to be occupied by Geo. B. Brigham of Westborough, completed; 150 x 40 feet, four stories high, and equipped with shafting, belting, hangers, and automatic sprinklers, two boilers of 110 horse power each and a 100 horse power engine. Factory owned by town and leased for five years for \$500 per annum. *June.* Work begun on new saw mill 54 x 95 feet for L. W. Phelps; old mill to be used as box factory. — Tannery of Alley Bros. & Place closed on account of failure. *July.* Brigham's new shoe factory closed on account of strike of lasters. *August.* Union Furniture Shop damaged by fire and closed for a short time. *September.* Brigham's new shoe factory again in operation. *December.* Tannery of Alley Bros. & Place started up in part.

**Barre.** In March, Harwood Brothers sold farm and saw mill property to William H. Whall of Boston, for manufacture of piano cases. *April.* Thomas C. Rich Co. began manufacture of window blinds. — New woollen mill of Crossley Manufacturing Co. completed and machinery introduced; main building 60 x 100 feet, two stories, with two ells 40 x 75 and 36 x 60 feet, respectively. *September.* Stock company organized to manufacture cotton-back plush in mill owned by J. Edwin Smith, to which addition will be built for accommodation of eight plush looms and other necessary machinery. *November.* Foundation of factory 100 x 45 feet begun; to be occupied by Birch & Dunbar for manufacture of piano cases. — Cotton mill of J. Edwin Smith unable to run all its machinery on account of low water.

**Becket.** In June, Ballou & Son began erection of new basket factory by side of present mill.

**Bellingham.** In June, work suspended at Ray's woollen mill, starting up again in July. *December.* Machinery in Ray Print Works sold; to be replaced by satinet machinery and mill to be operated under same management as heretofore.

**Beverly.** In January, Board of Trade announced that, during 1890, it had built three brick factories at an expense of \$60,000 and a wooden one at an expense of \$10,000. These were all

leased for five years, employed nearly 500 persons, and increased taxable property of town over \$100,000. *February.* Peter E. Clark's new saw mill put in operation. *March.* Beverly Building Association sold building occupied by T. B. Adams Manufacturing Co. to that firm and voted to erect another brick shoe factory. — Addition to Porter factory completed. — F. B. Mower & Son, shoes, dissolved; F. B. Mower continued business. — Seth Norwood Shoe Co. gave up system of lasting by hand and introduced six new lasting machines. *June.* Pedrick, Seavey, & Co., shoes, dissolved; business continued under name of Seavey & Co. *October.* John McGowan moved morocco business to Webber factory. — Addition made to plant of Masters & Walker, shoes. — John Wood, Jr., bicycles, opened department for boring barrels of sporting guns. — Firm of David LeFavour & Son succeeded by Davis & Morgan. — Saw mill of Peter E. Clark damaged by fire. *November.* Factories damaged by fire: George H. Allen, boxes, Woodbury Bros., J. H. Baker, Millett & Woodbury, and Wallis, Kilham, & Bray, shoes. *December.* Woodbury Bros., shoes, decided to remove business to Dover, N. H., with exception of cutting room still to be operated in Beverly. — Grain mill of C. J. Baker damaged by fire.

**BillERICA.** In January, grain mill of C. A. Holt & Co. destroyed by fire. *August.* Talbot Mills, flannels, shut down for one week.

**Blackstone.** In March, Lawrence Felting Mills shut down for annual inventory, also Woonsocket Rubber Co.; started up again middle of April. *August.* Evans & Seagrave's No. 2 woollen mill shut down for indefinite period. — Woonsocket Rubber Co. shut down for two weeks. *September.* Blackstone Woollen Co., Mill No. 2, started up with portion of its operatives. — No. 2 Waterford Mill shut down on account of slack business. *October.* Blackstone Woollen Co., Mill No. 2, started up in full. — Works of the Woonsocket Rubber Co. shut down for repairs. *November.* Portion of looms at Evans & Seagrave's mill run but four days a week. — Eighteen looms of the Blackstone Woollen Co. stopped: dull trade. — Blackstone Cotton Mills shut down on account of low water. *December.* Boot department of the Woonsocket Rubber Co. shut down on account of break in engine; one thousand employés affected.

**Boston.** [City Proper.] In January, Weeks & Potter, manufacturing druggists, incorporated as Weeks & Potter Co. — Morse Manufacturing Co. incorporated, capital stock, \$15,000, for manufacture of brass and iron bedsteads. — Factory and stock of Appleton Boot & Shoe Manufacturing Co. sold at auction to Pietsch & Kimberly. — National Association of Woollen Manufacturers held its annual meeting. — Fires for the month: Henry M. Peyser, gloves; A. S. Cheever & Co., paper boxes; Holmes & Co., knit underwear; Joseph W. Smith, suspenders; and J. J. & T. J. Folan, chamber furniture. *February.* Henry Traiser, of H. Traiser & Co., cigars, died, aged 64 years. — Fires for the month: G. T. McLauthlin & Co., machinists; Holden Bros., furniture; and Boston Woven Wire Mattress Co. *March.* C. F. Chickering of Chickering & Sons, pianos, died, aged 63 years. — Fires for the month: Gorman Bros., files; Hindle Fish, boilers; Henry W. Bigelow, spring beds; Jean White, music printer; and Gibbs & Perry, novelties. *April.* Automatic Winder Co. organized to manufacture automatic winding machines. — Atlas Tack Corporation organized with \$700,000 capital stock to manufacture tacks, rivets, etc., and absorb the American Tack Co., Fairhaven; Dunbar, Hobart, & Co., Whitman; Loring & Parks, Plymouth; Taunton Tack Co., Taunton; and Albert Field Tack Co., Taunton. — The New England Cotton Manufacturing Association held its annual meeting. — John Ridgeway, calcium light, died, aged 46 years. — Rufus B. Stickney of Stickney & Poor, spices, died, aged 67 years. — Samuel West, glass stainer, died, aged 64 years. — Allen Bros., trunks, damaged by fire. *May.* Massachusetts State Board of Trade met and admitted the boards of trade of Fall River and Fitchburg. *June.* Fires for the month: Evans & Sons, manufacturing chemists; L. N. Fredericks, printer; and John C. Rand, printer. *July.* Standard Stave & Cooperage Co. organized; capital stock \$400,000. — Fires for the month: Potter & Potter, publishers; Putz Pomade Co., metal polish; New England Brass Works; and H. E. Swift Manufacturing Co. *August.* Boston Blacking Co. reorganized and added new machinery. — Waitt & Bond, cigars, began erection of new factory 90 x 42 feet, six stories high. — Slattery & D'Arcy, sashes and doors, damaged by fire. — D. S. Walton & Co. sold business to National Folding Box & Paper Co. of Brooklyn, N. Y.; shop closed and machinery, etc., removed to Brooklyn. *September.* Goodyear Shoe Machinery Co. purchased and reorganized the Copeland Rapid Laster Co. to carry on business under name of Copeland Rapid Laster Manufacturing Co. — Factory of Thomas J. Graham & Co. damaged by fire. *October.* The Hobbs Manufacturing Co. leased factory in Worcester occupied by McIvers Bros. Machine Co., with intention of removing their business to that place.

*November.* New foundry of Tripp Manufacturing Co. completed, to be operated December 1. — American Bobbin, Spool, & Shuttle Co. added to their business the manufacture of druggists' wooden sundries. — Property of the Suffolk Cordage Co. turned over to National Cordage Co. — Boston Steam Gauge Co. incorporated under Maine laws; capital stock \$100,000. — Fires for the month: E. W. Miller, mouldings; Mellish, Byfield, & Co., chairs; Childs & May, furniture; William Bourne & Son, pianos; and Heliotype Printing Co. *December.* Wrought Iron Casting Co. incorporated; capital stock \$25,000. — New factory of the Emerson Piano Co. completed; building 65 feet deep, six stories high; engine house, boiler house, and six dry houses, all of brick and covering an area of 23,000 square feet. It is furnished with automatic fire alarm, automatic sprinklers, heated by hot air and lighted by electricity, and, including the lumber yard, occupies 68,000 square feet. — Factory of Masten & Wells damaged by fire. [Brighton.] In March, bindery of Samuel Hano Co. destroyed by fire. *May.* Jas. O. Whitten, proprietor Boston Glue Co., died, aged 57 years. *July.* Storehouse of Boston Varnish & Chemical Co. destroyed by fire. [Charlestown.] In February, Barrett Bros. dye house damaged by fire. *May.* Fires for the month: A. D. Hall & Co., refrigerators; Page, Littlefield, & Co., stairs. [Dorchester.] In April, Beacon Lithograph Co. incorporated under laws of New Jersey and plant of Buffords' Sons Lithograph Co. purchased by them from trustees. *July.* Construction of two new factories begun by Walter Baker & Co., chocolate. [East Boston.] In January, Ebenezer Hodge of E. Hodge & Co., boilers, died, aged 61 years. *February.* Fire damaged carriage factory of William Gilchrist & Son. *April.* Lockwood Manufacturing Co. completed additions to plant. *November.* Stimson Varnish Co. suspended operations. — Geo. M. Strong, check loops, died. [Roxbury.] In May, E. Howard Watch & Clock Co. reduced its working time one-quarter and its force by 100 persons. *August.* Fire damaged carriage shop of John Scott & Son. [South Boston.] In February, fires occurred in the factories of Oakman Manufacturing Co., glass, and Pierce & Son, shoes. *June.* South Boston Iron Works shut down for inventory. — Pratt Manufacturing Co. succeeded by Finders' Supply Co. in manufacturing button setters. — Shales & May's furniture factory destroyed by fire. *July.* H. A. Williams Manufacturing Co. began erection of new factory for production of mill supplies; factory completed in September, 60 x 100 feet, six stories high. — Tripp Manufacturing Co. decided to locate new works at South Framingham. *August.* Putnam & Co.'s mattress factory damaged by fire. — Suffolk Manufacturing Co. retired from business. *November.* Erection of new buildings begun for the Bartholomay Brewing Co. of Rochester, N. Y., Never Slip Horseshoe Co., and Gorman File Co. [West Roxbury.] In March, the dyeing plant of F. P. Robinson Co. destroyed by fire. *November.* Cable Rubber Co. started up in full after a shut down of two weeks.

**Bradford.** In February, the new factory of Knipe Bros., shoes, nearly completed and machinery introduced. The main building, of wood, is 200 x 45 feet, three stories high. — James T. Currier of Concord, N. H., purchased land and began erection of buildings for the manufacture of heavy express and delivery wagons; main building 40 x 60 feet, three stories high, and blacksmith shop 30 x 40 feet. *March.* Knipe Bros.' shoe factory dedicated. *June.* F. H. Poor began building shops, 50 x 200 feet, two stories high, for manufacture of steam pumps and shoe machinery. *July.* Knipe Bros.' shoe factory shut down for one week. *November.* Factory of Knipe Bros., shoes, started up in full. — Harrison Williams, shoe manufacturer, died.

**Braintree.** In January, Kinsley, Davis, & Co., shoddy, suspended operations. *July.* The leather bleaching shop of A. B. Keith destroyed by fire. *October.* Columbia Rubber Co. added new room to plant for the manufacture of rubber clothing. *November.* Jenkins Manufacturing Co. added 60 new braiders and other machinery to mill. *December.* Rice & Hutchins leased new factory for the manufacture of shoes.

**Bridgewater.** In January, Perkins Bros. built an addition to their wire nail mill, enlarged annealing furnace, and put in another pickling vat. *February.* Ferguson Bros. removed machine shop to Boston, Brighton district.

**Brockton.** In January, plans completed and operations begun on erection of shoe factory for Swedish Co-operative Boot & Shoe Co., to be 35 x 100 feet, four stories high. — Coehuitate Box Toe Co. started new branch factory. *March.* New England Castor Co. organized to manufacture roller castors. — Myron L. Keith built machine shop for manufacture of shoe machinery. — Scandia Shoe Co.'s factory destroyed by fire. *April.* Royal Case Co., fancy leather goods, moved into larger quarters. — Eppler Welt Machine Co., capital stock \$600,000, organized. — B. F. Reynolds occupied new shoe factory. — Whitman & Keith began erec-

tion of shoe factory on site of recently burned shops, to be 40 x 200 feet, four stories high. — Fires for the month: Whitman & Keith, shoes; P. B. Keith, shoes; Mitchell & Millett, shoes; and E. M. Low, paper boxes; Mitchell & Millett, discontinued manufacturing. *May.* Fire destroyed building and stock of Dow Manufacturing Co. *June.* C. A. Coffin & Co., shoes, increased capacity by moving the old Keith factory and connecting it with their own. *July.* Albert Barrows, shoes, built an addition to factory, 30 x 40 feet, two stories high. — Nearly all of the shoe factories shut down for one week on account of slack trade. — I. A. Beals Shoe Corporation disposed of stock, fixtures, etc., to a new company; plant removed to Holliston. — Walker, Taylor, & Co., shoes, built an 88-foot addition to factory. *August.* Howard W. Reynolds, shoe manufacturer, died, aged 48 years. — The H. W. Reynolds factory ran out the stock on hand and closed entirely, owing to death of Mr. Reynolds. — Holmes Bros. & Co. moved to this city from Bridgewater. — C. L. Hawthaway & Sons, Boston, purchased business of Brockton Blacking Co. *September.* New factory of James Means & Co. completed and manufacturing begun; building is 192 x 37½ feet, four stories high. *October.* Brockton Shoe Co. incorporated under Maine laws with capital stock of \$25,000 to operate the Copeland Shoe Factory. — Factory of T. A. Norris Machine Co. enlarged. — Factory of Edwin Keith, shoes, started up in full. — Reynolds, Drake, & Gabell shut down temporarily. — Factory of I. A. Beals sold to Emery M. Low, paper boxes. *November.* J. C. Tannatt started in business, manufacturing shoes. — A. M. Herrod, shoes, shut down one week to take account of stock. *December.* Firm of Houghton, Coolidge, & Co. dissolved and factory closed. — Shoe shipments for the year 1891 were 438,254 cases against 469,607 cases in 1890 a decrease of 31,353 cases or 6.67 per cent. The following table shows the shipments since 1880:

YEARS.	Cases	YEARS.	Cases
1880, . . . . .	189,490	1886, . . . . .	361,584
1881, . . . . .	218,726	1887, . . . . .	383,404
1882, . . . . .	261,657	1888, . . . . .	422,282
1883, . . . . .	290,054	1889, . . . . .	433,452
1884, . . . . .	326,858	1890, . . . . .	469,607
1885, . . . . .	333,980	1891, . . . . .	438,254

**Brookfield.** In January, Dufton, Richards, & Preston, satnets, closed mill, owing to financial complications. — G. H. Burt & Co., shoes, moved into new addition and ran factory overtime to catch up with orders on hand. *April.* The Forbes woolen mill, formerly run by Dufton, Richards, & Preston, sold at auction to the Ware Savings Bank. *May.* Work begun at the upper brick yard of the Parmenter Manufacturing Co. *September.* Brick kiln sheds of Parmenter Manufacturing Co. damaged by fire. *November.* Forbes Mill leased by Carpenter & Akers and manufacture of satinet begun. *December.* Building occupied by R. T. Grant, woolen yarn, and Israel Wedge, packing boxes, entirely destroyed by fire.

**Cambridge.** In January, the Cambridge Baking Co. incorporated; capital stock \$5,000. — Roberts Iron Works damaged by fire. *February.* The Kennedy branch New York Biscuit Co. began construction of new boiler house and chimney containing two 72-inch high pressure boilers and a double engine. — Leander Greeley, builder and contractor, died, aged 57 years. — Wm. Campbell & Co. occupied new factory 70 x 125 feet, with two story annex, 30 x 60 feet, adjoining. — J. H. Keenan's moulding mill enlarged. — An addition 40 x 65 feet erected to factory of American Rubber Co. — Carpenter shop of American Rubber Co. damaged by fire. *April.* The plant of Roberts Iron Works burned in January, rebuilt and work on product begun. — H. F. Sparrow, confectionery, built new factory, 45 x 105 feet, four stories high. *May.* Robert Henderson, carriages, died, aged 85 years. *June.* Barbour, Stockwell, & Co. completed new plant consisting of foundry, 175 x 75 feet; machine shop, 100 x 50 feet, three stories high; and pattern storage house, 100 x 60 feet, three stories high, besides other outbuildings. *July.* John Blakie, boatbuilder, died, aged 56 years. *August.* Fires for month: Damon & Co., safes; Edward Kendall & Sons, machinists; Harvard Dry Plate Co.; and Fred. H. Holton & Co., copper (twice). *October.* John P. Squire & Co., pork packers, damaged by fire; portion of plant burned to be rebuilt. *November.* The rolling mills of Gilmore & Eustis discontinued operation. — James C. Davis & Son, soap, destroyed by fire. *December.* The pottery works of A. H. Hews & Co. destroyed by fire; plant to be rebuilt. — George B. Clark, telescope maker, died, aged 65 years.

**Canton.** In January, foundation of new mill for Knitted Fabrics Co. laid. *March.* Crow Blacking Co. erected new factory, 40 x 60 feet. *June.* The new mill of Knitted Fabrics Co. started up. — Eureka Silk Manufacturing Co. reorganized as the Eureka Silk Co. with capital stock of \$626,000. *August.* Lexington Print Works decided on locating in this town. *November.* Stratton Bros., knit goods, decided to remove their plant to Stoughton.

**Charlton.** In June, two new looms added to C. W. Pikes' satinet mill.

**Chelmsford.** In March, Moore & Riddick leased old mill at Brookside and began alterations. *June.* Geo. C. Moore, wool scourer and manufacturer of carpet yarns, built new mill 125 x 40 feet and introduced two new 36-inch turbine wheels. *July.* Beaver Knitting Co., formerly John Byfield, incorporated with capital stock of \$25,000.

**Chelsea.** In March, Magee Furnace Co. destroyed by fire. *April.* Factory of E. L. & F. S. Rollins, window shades, partially blown down during gale. *July.* The Chelsea Pottery U. S. incorporated with capital stock of \$10,000. *August.* Fire damaged chair factory of White, Holman, & Co. *December.* The Salamander Brick & Tile Co. voted to increase capital stock from \$30,000 to \$80,000. — Chelsea Cordage Co. purchased plant formerly owned by Suffolk Cordage Co. and began manufacturing.

**Chester.** In March, F. S. Gross sold his granite quarries and plant to the Hudson & Chester Granite Works.

**Chicopee.** In January, stock company formed with capital stock of \$10,000 to manufacture trusses. — Work begun on new shop for Taylor, Bramley, & Co., knit goods. — Forty men added to force of machinists employed by Ames Manufacturing Co. — John R. Whittemore, agricultural tools, died, aged 69 years. — J. H. Hoague, machinists' tools, purchased new factory to accommodate growing business. — Fire damaged cloth room Dwight Manufacturing Co., cotton goods. *February.* New engine house Dwight Manufacturing Co. completed; the engine of 1,000 horse power, compound, with two cylinders. — Lamb Knitting Machine Manufacturing Co. began manufacture of bicycles. *April.* Fire damaged picker room and weave room of No. 1 and No. 2 mills Dwight Manufacturing Co. *May.* New factory of Taylor, Bramley, & Co., knit goods, completed and occupied; building of brick, 65 x 50 feet, three stories high. Twenty-five knitting machines set up and fifty persons employed. *July.* Slight fire occurred in picker room, No. 2, Dwight Manufacturing Co. *August.* Ames Manufacturing Co. shut down ten days for repairs and annual inventory. — Stevens Arms Co. shut down owing to breaking of engine cylinder. *September.* Additions and improvements made to plant of Chicopee Manufacturing Co. *October.* A new factory, 50 x 86 feet, built by Overman Wheel Co. for manufacture of rubber tires. — Overman Wheel Co. shut down temporarily. *November.* Low water caused several stoppages at mill of Chicopee Manufacturing Co. *December.* Dwight Manufacturing Co. damaged by fire; portion of plant burned to be rebuilt.

**Clarksburg.** In November, Hayden & Bratton bought grist mill of F. W. Wellsby. — Fire partially destroyed the drying house of the Linwood Mills; to be rebuilt.

**Clinton.** In January, Ridgeway Furnace Co.'s buildings leased by Leominster Worsted Co. *February.* Clinton Gas Light Co. completed new brick building for electric light plant. — Lancaster Mills changed carding system from American to English, and introduced new pickers and fly frames. — Work begun on new engine and boiler house for Leominster Worsted Co. *March.* Plant leased by Leominster Worsted Co. to be run by this company under name of Clinton Worsted Co. Twenty-five new looms put in and new engine and boiler house, 27 x 34 feet, constructed. *May.* Lancaster Mills broke ground for new building 115 x 155 feet, four stories high. *July.* Bigelow Carpet Co. shut down for two weeks for vacation and repairs. *August.* Brick addition made to Clinton Woollen Mills. *October.* Two years' lease taken of old counterpane mill by Smith, Barr, & Co. for manufacture of linen thread. *November.* Machinery in new mill of Lancaster Mills Co. set up. *December.* Bigelow Carpet Co. began to run full time.

**Concord.** In March, Damon Manufacturing Co., flannels, placed 11 sets of cards on tennis cloth. *August.* A. B. Black sold carriage factory to A. H. Harrington. *October.* Damon Manufacturing Co. shut down temporarily. *December.* Product of Damon Manufacturing Co. changed from flannels to dress fabrics.

**Conway.** In October, Delabarre Woollen Mills shut down for balance of year.

**Dalton.** In February, Smith's grist mill shut down on account of washout in bank of reservoir. *March.* C. E. Bradley purchased half interest in G. J. Jordan's machine shop; firm to be known as Dalton Machine Co. *April.* Lasting department Dalton Shoe Co. ran nights to complete orders. *June.* New foundry of Dalton Machine Co. completed. *July.* Weston's Centennial Mill shut down 3d for repairs and started up again 14th. — Weston's Defiance Mill shut down for repairs and setting up of two new boilers; started up again in August. *August.* Jas. B. Crane, paper manufacturer, died, aged 74 years. His father, Zenas Crane, established, in 1799, the first paper mill in Berkshire county. *September.* Foundry of Dalton Machine Co. turned out castings for first time. — Z. & W. M. Crane shut down for vacation. *October.* The rag room Crane & Co.'s mill shut down on account of broken shaft. — Old Berkshire Paper Mills shut down for repairs. *December.* Weston's Paper Mill shut down temporarily.

**Dana.** In February, Thompson & Haskell's portable steam saw mill set up in Grover's wood lot and lumbering begun. *March.* Southworth & Doane leased hat factory of N. L. Johnson and began manufacture of palm leaf hats. — Henry W. Goodman & Co., palm leaf hats, damaged by fire. *September.* Crawford & Tyler, woollen goods, shut down for repairs. *October.* Hat factory of Henry W. Goodman & Co. enlarged and new machinery put in.

**Danvers.** In February, Croas & Murphy's morocco shop damaged by fire twice. *March.* Reynolds & Avery, heels, moved into new factory. *April.* Aldus & Sargent, heels, moved into factory formerly occupied by W. A. Maguire. — B. Bernard & Co., morocco, enlarged factory which was built for them in 1890; another boiler and more limes and soaks were put in, doubling capacity. *July.* Citizens of the Centre decided to build a factory, 45 x 100 feet, two stories and basement, for E. & A. Mudge Shoe Co., to induce firm not to move to Maine as contemplated. — New brick kiln added to plant of Edward Carr. *September.* The shoe firm of Crosby, Huckins, & Co. dissolved; J. E. Crosby & Co. continued. *December.* Nathaniel Glover & Co., shoes, dissolved; Nathaniel Glover continued under same firm name.

**Dedham.** In March, fire damaged slipper factory of Geo. W. Gaston; rebuilt. *April.* Geo. W. Gaston's new factory destroyed by fire. — Chas. L. Harding, principal owner Merchants Woollen Co., died, aged 77 years. *June.* Norfolk Mills shut down indefinitely. *July.* Merchants Woollen Co. shut down 1st to rebuild dye-house; started up again 31st in part, running 75 of its 129 looms.

**Deerfield.** In August, factory of Nonotuck Pocket Book Co. destroyed by fire. *October.* Nonotuck Pocket Book Co. moved to Northampton.

**Dennis.** In September, Casey Bros. Shoe Manufacturing Co. sold to W. B. Bowne. *December.* West Dennis Shoe Co. incorporated; capital stock \$24,000.

**Douglas.** In June, W. E. Heywood & Co. built addition, 30 x 40 feet, three stories, to woollen mill. — Work of removing machinery of Underhill Edge Tool Co. from Nashua, N. H., begun.

**Dudley.** On July 1, Stevens Linen Works shut down for four days, starting up in full on the 6th.

**Easthampton.** In January, decided by Williston & Knight, buttons, to move its ivory button works from Bridgeport, Conn., to this town. Work laid out for new factory 134 x 44 feet, three stories high. *February.* Glendale Elastic Fabrics Co. sold to Easthampton Elastic Web Co. its mill, boarding house, and six tenements. *May.* The Webster & King silk mill which had been idle for nearly three years, sold at auction to A. B. King, member of old firm, who also purchased, in March, the machinery from the New York owners. The mill to be started up on other forms of silk manufacture than dress goods, the former product. *June.* Williston Cotton Mills suspended operations. *September.* Williston & Knight, buttons, built storeroom in rear of new mill. *December.* Williston Cotton Mills sold at auction to G. H. Seelye of New York. — Easthampton Gas Co. bought plant of People's Electric Light Co. and built brick building adjoining gas works for electric light station.

**Everett.** In March, fire destroyed woodworking mill of Henderson Bros. *December.* Additions made to foundry at West Everett.

**Fairhaven.** In April, Fairhaven Iron Foundry Co. incorporated; capital stock \$20,000. **May.** American Tack Co. sold to Atlas Tack Corporation. **August.** American Tack Co. shut down permanently.

**Fall River.** In January, Weetamoo Mills reported that \$3,168 had been expended for new machinery during 1890. — Report of Blade Mills showed outlay of \$12,341 in improvements and new machinery in 1890. — New engine recently put into the Borden Mills in successful operation. — New machinery added to the new Globe Yarn Mills and roof completed. — J. W. Foster, superintendent of spooling with the Fall River Machine Co., purchased spooler business of that company and removed to Springfield, to manufacture spools, etc. — Ashworth Bros., Manchester, Eng., accepted the terms of the Globe Yarn Mills for seven acres of ground upon which to erect machine shop. — Bourne Mills' officials issued circular inviting overseers and employes to join with them in establishment of savings bank in connection with profit sharing scheme, the idea being to open an account with any employé who would like to save part of wages earned; any sum, from five cents to \$50 being placed to his credit at the rate of not less than 5 per cent interest. When amounts accumulated to sum of \$100, accounts must be settled and each employé may receive his money or have it deposited, in his name, in any savings bank he may desire, and a new account opened. — Overseers and operatives of Bourne Mills received their share of the profits for the past six months. The number benefited was 406, and \$1,275.44 divided; smallest amount paid to any individual was 88 cents, and the highest was over \$14. Weavers received from \$2 to \$6 apiece, and speeder tenders drew as much as \$5 and as little as \$2.50. — Print cloth statistics for 1890 as follows: Production for the year, 9,937,000 pieces; stock on hand at close of year, 583,000 pieces; sales, "odds," 3,876,000 pieces; 64 x 64's, 4,524,000 pieces; 60 x 56's, 184,000 pieces; total, 8,584,000 pieces; sold for future delivery at close of year, 1,540,000 pieces. The average prices during year were as follows: 64 x 64's, 3.34 cents; 60 x 56's, 2.96 cents; the average price of goods less than any year since 1886, and stock on hand three times greater than average of preceding five years. — The Wampanoag Mills shut down, owing to a break in engine; King Philip Mills on account of a scarcity of filling; and the Fall River Hat Factory for stock taking and addition of new machinery. **February.** During 1890 Shove Mills paid \$13,075 for new machinery. — The Troy Cotton Mills added 10,000 new spindles to plant. — Barnaby Mills filled the addition recently built with about 200 new looms. — New engine, 1,200 horse power, added to Davol Mills; the main shaft weighed twenty tons. — Repairs on the Wampanoag Mills engine completed; all spinners, for first time in six weeks, at work. — Cornell Mills shut down on account of strike among weavers. **March.** Stockholders of Globe Yarn Mills voted to increase capital stock from \$900,000 to \$1,200,000. — American Print Works replaced wooden dye-house vats with iron ones. — Wampanoag Mills ordered plans for new weave shed, capacity of 500 looms; ground broken and work begun. — I. Harris purchased shoe manufacturing establishment of C. H. Colby & Co., and began manufacture of misses and children's shoes. — Circular issued to employes of Bourne Mills to the effect that profit sharing would be discontinued after July 1 unless employes were interested enough to buy an "Employé's Saving Fund Account Book" whether they deposited or not, and any employé making a deposit before May 1 should receive a book free. These books to contain an interest table at 5 per cent, a printed contract, blank pages for accounts, and also a record for wages and for semi-annual dividends paid on wages. — The picker room of the Granite Mills was partially destroyed by fire. — The following shutdowns on account of repairs were noted during the month: Globe Yarn Mill No. 2; Stafford Mill No. 2; Wampanoag Mill No. 1; and Border City Mill No. 3; while the Robeson Mills shut down on account of a strike of 11 spinners, who complained of too high speed, resulting in a cut down in wages. **April.** D. D. White Shoe Co. organized; plans for new factory completed. — The Robeson Mills began arrangements for improvements in plant, to include new engines, new boiler house, new boilers and the building of a chimney 175 feet high. — New weave shed to contain 1,500 looms, built by Durfee Mills. Mill managers adopted payments by hour and graded the product of each employé. **May.** Extension to Globe Yarn Mill No. 2 completed and machinery set up. — Wampanoag Mill No. 1 and Pocasset Mills added new machinery. — In Granite Mill No. 2 the section of looms engaged in weaving prints shut down for an indefinite period; while the Metacomet Mills closed to make repairs on engines. — Fire partially destroyed the picker room in Granite Mill No. 2. **June.** Fall River Mill Supply Co. leased its building and machinery to Bronson & Austin, who continued the business. — The following shutdowns noted during month: Barnaby Mills closed for few days; American Linen Mill closed for repairs; and the Shove Mills closed indefinitely on account of strike among weavers. — Fire destroyed Border City Mills Nos. 1 and 2 and partially destroyed the picker room in the Hargraves Mill. — Foster H. Stafford, president and agent of the Stafford Mills, died, aged 77 years. **July.** Flint Mills removed section of narrow looms to be replaced by looms to weave twills. — A new concern, known as the Consolidated Metallic Fastening Co., secured the

assets of the Bay State Shoe Fastening Co.; new organization will not only continue the business but will give stockholders in the late Bay State Co. until August to pay in and receive share for share. — Owing to a clerical error made in 1889, spinners of the King Philip Mills were paid less than earned; error just discovered and operatives received back pay for that period amounting to 44 cents per week. — Bourne Mills declared semi-annual dividend to their employes of  $\frac{3}{4}$  per cent of their wages; profit sharing continued. — Wyoming Mills started up. — Granite Mill No. 2 shut down because of accident to engine. — American Print Works closed for annual inventory and general cleaning up. — Fire destroyed 600 bales of cotton in the yard of Seaconnet Mills. *August.* Hargraves Mills voted to build a two-story addition to plant 120 x 42 feet, to contain looms and office. — The Jesse Eddy Manufacturing Co. made improvements in their dye-house. — The Durfee Mills built new weave shed 112 x 200 feet, to accommodate about 1,200 looms. — Weavers in Osborn Mills notified that after September 1 the graded system would be adopted in fixing payment for weaving. The Border City, King Philip, and Barnaby mills now working under same system. — Wyoming Mills shut down on account of over production. — Fire partially destroyed twice mill of J. H. Estes & Son. — Edwin Shaw, director of the Tecumseh and King Philip Mills, died, aged 75 years. *September.* Merchants Mills started up after shutdown of several days. — Robeson Mills shut down to make some changes and improvements; new boiler set, an economizer added, and a new boiler house built. — A pulley in each of the Sagamore Mills broke, causing a stoppage of machinery. — Fire caused damage in card room of Osborn Mill No. 2. — William C. Cornell, a member of the firms of D. H. Cornell & Son, and D. H. & W. C. Cornell, beef and pork packers, died, aged 37 years. *October.* New machinery added to works of Fall River Hat Co. — The following amounts paid during 1890-91 for improvements and new machinery: Robeson Mills, \$14,607; Wampanoag Mills, \$76,750; Union Mills, \$25,000; Barnard Manufacturing Co., \$9,167; and Merchants Mills, \$36,332. — Directors of Hargraves Mills decided to build addition to mill four stories high instead of two as originally planned. — Weavers at Barnaby Mills had wages increased. — Shove Mills began to manufacture fancy cotton goods. — New 350 horse power engine put in by Fall River Electric Light Co. — Robeson Mills started up after being shut down several weeks for repairs. — A number of mills obliged to shut down on account of low water. — Durfee Mills Nos. 1 and 3 shut down for repairs, and Weetamoe Mills closed for week. *November.* Pocasset Manufacturing Co. recently built office and made improvements in mill. — A. G. Thurston & Son added new plant for manufacture of plate rolls and general mill machines. — The dyers of Barnaby Mills received an increase of wages of \$1 a week. — The picking and carding departments of Wampanoag Mill No. 1 overhauled and new flat cards and pickers put in. — New boiler added to Border City Mills. — Following amounts paid during 1890-91 for improvements and new machinery: Hargraves Mills, \$25,400; Flint Mills, \$7,593; and Border City Manufacturing Co., \$40,000. — Fire slightly damaged Troy Mills. *December.* Wampanoag Mills received an instalment of Russian Jews who were taught weaving. — Ground broken for new weave shed, 400 x 180 feet, for King Philip Mills. — All wide looms in Bourne Mills replaced by narrow ones. — Algonquin Print Works started up with about 100 bands; works comprise two main buildings, 170 x 60 and 120 x 50 feet in size. — A gale blew down the 130-foot chimney of Conanicut Mills and demolished a shed over 100 feet long belonging to Globe Yarn Co. — Mill of Jesse Eddy Manufacturing Co. closed to allow time for change in styles. — Low water caused a partial shutdown at the Davol, Robeson, Tecumseh, Durfee, and Union Mills. — During the year, 85 out of 2,155 looms stopped for 19 weeks at mills of Merchants Manufacturing Co. — Annual cloth statement showed production of 9,985,000 pieces as against 9,937,000 pieces in 1890. Stock on hand 90,000 pieces as against 583,000 pieces in 1890. Sales of the year were 8,838,000 pieces as against 8,584,000 pieces in 1890. There were 1,375,000 pieces sold for future delivery as against 1,540,000 last year. Earnings of cotton mills in 1891, as shown by annual dividends, were \$479,920 less than in 1890, the figures being \$1,428,370 paid out to stockholders in 1890. Total capital stock on which dividends were paid in 1891 was \$16,540,000, and the average dividend was 5.73 per cent, or \$948,450. Out of 33 corporations seven paid no dividends.

**Fitchburg.** In January, cotton waste mill of Rodney Wallace partially destroyed by fire. *February.* Thorn Medicine Co. moved from Vermont to this city. — Fitchburg Shirt Co. began manufacture of shirts at premises formerly occupied by W. S. Rice. *March.* Mitchell Manufacturing Co. organized for manufacture of Scotch gingham; company an offshoot of the Glasgow firm of A. M. Mitchell, Jr., & Sons. — Mill "A" of Parkhill Manufacturing Co. put in and started up 72 new looms. — Orswell Mills began erection of extension to present building four stories high, extending east about 200 feet, with tower like present one. *April.* Ground broken for new mill of Mitchell Manufacturing Co.; building to be 350 x 54 feet, two stories, and engine and boiler house 92 x 40 feet. — Fitchburg Paper Co. added a Fourdrinier paper machine, with rag engines, also 100 horse power engine, and boiler; capacity doubled.



— Fitchburg Shoe Tip Co. removed to new quarters and increased capacity. — Fire partially destroyed building occupied by M. Webber as planing mill; S. N. Weston, reed maker; J. M. Ballou, saw flier; and J. L. Stratton, machinist. *May*. Foundation of Mitchell Mill completed and brick work begun. *June*. Iver Johnson & Co. purchased plant of the Walter Heywood Chair Co. to be used for manufacture of bicycles and firearms; plant consists of three buildings, one two-story brick building 300 x 50 feet, two storehouses 100 x 50 feet, office 75 x 50 feet, stable, and five acres of land. Factory has capacity for 1,500 men. — Ground broken for building of Fitchburg Engine Co.'s new plant. *July*. A. C. Caswell began manufacture of his new machine in factory of L. C. Albee. — Batters set and work begun on foundations of drop forging and blacksmith shop of Iver Johnson & Co. — Fitchburg Paper Co.'s Mill No. 1 started up after a week's shutdown for repairs. — B. M. Pitts, cotton yarn, shut down to repair water wheel. *August*. Addition, 193 x 54 feet, built to Wallace's No. 3 Mill. *September*. Addition to Orswell Mills completed and machinery set up; mill to contain about 15,000 spindles, and used for making fine yarn. — Iver Johnson & Co., revolvers and bicycles, moved their machinery from Worcester to this city. — Beoli Mills shut down to allow employes to attend fair. — Samuel E. Crocker of Crocker, Burbank, & Co., paper manufacturers since 1863, died. *October*. Putnam Machine Co. reduced time to eight hours daily, from 7.30 A.M. till 4.30 P.M. — Mitchell Manufacturing Co. started up. — Fitchburg Paper Co.'s Mill No. 3 shut down for repairs; another machine put in and capacity increased. *November*. McTaggart's Woollen Mill with an extra set of hands ran overtime. *December*. Fitchburg Duck Mill laid foundation for storehouse, 40 x 100 feet; capacity 1,200 bales of cotton. — Ground broken for new shop, 35 x 80 feet, for Fitchburg File Works. — New dye-house built for J. Wingrin, formerly dyer for Parkhill Manufacturing Co.

**Foxborough.** In October, a new factory 100 x 50 feet built, to be used as a dye-house.

**Franklin.** In June, C. J. McKenzie shut down his four-set satinnet mill for an indefinite period, on account of ill health. *December*. The Saxon Worsted Co. ran mills until 10 o'clock, five nights in the week. — The McKenzie satinnet mill started up after a shut down of six months.

**Framingham.** In February, Pará Rubber Shoe Co. shut down owing to over production in the heavier grades of rubber goods. *March*. New factory built by A. Fales & Sons. *May*. Work resumed at Pará Rubber Shoe Co. *July*. Tripp Manufacturing Co. of Boston decided to locate new works at South Framingham, to erect a factory 340 x 60 feet. — Work on foundation of new Saxonville Mills begun. *September*. The Pará Rubber Shoe Co. formally notified South Framingham Manufacturing Co. that it would buy buildings occupied by it for past ten years. — Pará Rubber Shoe Co. shut down for indefinite period. *October*. Gregory & Co. built one story addition to their shoe factory, 40 x 40 feet, for office and salesroom. — A knitting plant for manufacture of elastic stockings and other specialties, established by C. J. McPherson. — Benjamin F. Coburn, 64 years old, treasurer of Gregory & Co., shoes, died. *November*. Gregory & Co., shoes, succeeded by Gregory, Shaw, & Co.

**Freetown.** In November, N. R. Davis & Sons raised gun factory one story and put on Mansard roof; capacity increased one-third.

**Gardner.** In January, Frank Smith, silversmith, shut down ten days for repairs and inventory. *February*. Wright & Read, chairs, dissolved; business continued as Wright, Read, & Co. — Heywood Bros., chairs, shut down for repairs. — Henry C. Knowlton of A. & H. C. Knowlton, chairs, died, aged 58 years. *March*. Chair works of S. K. Pierce & Son enlarged by erection of new building 45 x 108 feet, three stories high. *April*. Foundation laid for another engine at Richard's pulp mill. — C. F. Richardson entered into partnership with Henry Hadley under firm name Hadley & Richardson, pails and woodenware, and began erection of three story addition to factory. *June*. Blount Manufacturing Co. leased portion of Conant & Bush's factory for manufacture of door and window springs, etc.; additions made to plant so that factory was 36 x 130 feet, two stories high. *September*. Ames Merrill of Heywood Brothers & Co., died, aged 55 years. *December*. Works of Wentworth Spring & Axle Co. destroyed by fire. — John R. Conant, of Conant, Ball, & Co., chairs, died.

**Georgetown.** In July, fire destroyed ice house of Andrew M. Abbott. *December*. G. W. Chapin & Co. increased plant 75 per cent and added a new line of shoes to product.

**Gloucester.** In March, Lewis H. Merchant, box manufacturer, died, aged 42 years. — Board of Trade received proposition from Day Cordage Co. of Cambridge to establish cordage factory here. *October.* Cape Ann Anchor Works erected new machine shop 120 x 35 feet, and added new automatic machinery, including 120 horse power engine and rough turning lathes. — Richardson, Howe, & Lovejoy of Boston leased quarters for manufacture of womens, misses, and children's underwear and wrappers; 114 machines run by electricity to be used. *December.* A. B. Noyes Shoe Corporation shut down on account of so many employes being ill with influenza.

**Grafton.** In January, James Paton of Johnstone, Scotland, leased factory in order to establish American branch for manufacture of shoe laces. — New shoddy company rented mill of Crocker Emery Works. — J. W. Putnam, retired shoe manufacturer, died, aged 89 years. *March.* Basement of Gibbs & Allen's boot manufactory flooded with water. *April.* A portion of machinery set up in new shoe laces mill leased by James Paton. — Forbush & Brown, shoes, started up on full time after a shutdown, during which repairs were made. — Hubley's shoddy mill damaged by fire. *August.* Currying shops of A. & A. Bigelow and L. W. Dodge & Son closed on account of surplus leather on hand. *October.* Entire plant of Fisher Manufacturing Co. in operation, including the 200 new looms lately put in. — Forbush & Brown, shoes, started up for the fall and winter trade. — Currying shops of L. W. Dodge & Son and A. & A. Bigelow shut down for indefinite period. *November.* Pratt Manufacturing Co., cotton, shut down for repairs to boiler. *December.* Farnumville Cotton Mill shut down for a few days.

**Great Barrington.** In February, Everett Woollen Co. added a story to its weave room. *July.* Everett Woollen Co. closed mill for two weeks' vacation and repairs. *September.* Everett Woollen Co. shut down to allow help to attend fair. *December.* Building of Monterey Creamery Corporation destroyed by fire; to be rebuilt.

**Greenfield.** In January, new mill of Wiley & Russell Manufacturing Co., cutlery, completed; building of brick 140 x 45 feet, two stories high. *February.* Cutler, Lyons, & Field, shoes, began erection of new factory, 176 x 38 feet, three stories high. *March.* David Davidson purchased brickyard of G. J. Knights. *June.* Cutler, Lyons, & Field moved into new factory. — Towle Manufacturing Co., silversmiths, shut down for annual inventory. *July.* Wiley & Russell Manufacturing Co. shut down for inventory and repairs. *September.* F. A. Rugg built a 55-foot extension, two stories high, to his wood work shops and a wing 10 x 45 feet. *December.* Cutler, Lyons, & Field, private firm, incorporated as "Cutler, Lyons, & Field Incorporated" for manufacture of shoes and foot wear; capital stock \$75,000; ground broken for another factory adjoining present new factory, giving room for employing 100 additional hands.

**Hadley.** In June, grist mill of William Phillips damaged by fire.

**Hardwick.** In June, extension to paper mill of George W. Wheelwright begun. *September.* Addition to mill of George H. Gilbert Manufacturing Co. begun; one building of brick 40 x 90 feet, two stories high, to be used for carbonizing purposes, and another, three stories high, for spinning.

**Haverhill.** In January, Chick Bros.' factory started up on nine-hour time, having run one month on eight-hour time. — Perley A. Stone moved into new factory. — Factory of Friedman, Jennings, & Stevens, shoes, flooded by rains; one hundred and fifty workmen temporarily idle. — New shoe factory of J. H. Winchell & Co. dedicated; building of brick 200 x 75 feet, seven stories high, with flooring space of 86,000 square feet. — E. S. Woodbury & Lefavour, shoes, discharged all bottomers. *February.* Factory of Thomas S. Ruddock & Co. damaged by fire; work to be resumed. — Charles S. Kendrick, shoe manufacturer, died. *March.* New factory of Gale Shoe Manufacturing Co. completed; to furnish employment for 275 hands and have a capacity of 3,000 pairs slippers daily. — J. H. Winchell & Co., shoes, shut down portion of factory operating on turned work. — New firm known as Sawyer Shoe Co. incorporated and manufacturing begun in factory vacated by A. S. Currier. — J. H. Winchell & Co. leased shoe factory at Exeter, N. H., with intention of moving portion of business to that point. — Factory occupied by E. S. Woodbury & Lefavour shut down temporarily for repairs. — Levi C. Wadleigh, Jr., of L. C. Wadleigh & Sons, lasts, died. *April.* Wallace, Elliott, & Co., shoes, shut down for three days. — E. E. Parker and J. H. Kimball started in business, manufacturing women's shoes, under name of E. E. Parker & Co. — Shoe contracting business of N. Provost & Co. purchased by C. H. Heath. — Tenney & West started manu-

factory of tongues, tips, facings, and leather trimmings. — Machinery of Knipe Bros. transferred to new buildings at Bradford. — E. S. Woodbury & Lefavour began moving portion of business to Salem. — Field, Thayer, & Co., shoes, shut down their cutting department on account of dull trade. — The Pentucket Flexible Inner Sole Co. organized to manufacture heels, rands, and flexible inner soles. — A. F. Smith, shoes, Lynn, leased factory of Hoyt, Dow, & Kennedy for five years and will move portion of plant here, retaining factory in Lynn. *May.* Gale Shoe Co. moved into new factory and operations begun; building of brick 100 feet square and six stories high. — Factory of W. B. Thom & Co., wool hats, started up in full. — Sewall F. Prescott, shoe patterns, and George W. Mitchell, shoe manufacturer, died. *June.* Oulton Manufacturing Co. formed under laws of State of Maine, capital \$50,000, to manufacture sofa beds and adjustable chairs and couches. — Spaulding & Swett removed to new factory. — Stockholders of the Exeter (N. H.) Building Association, met and decided to erect a new brick shoe factory, to be leased by Gale Bros. of this city, for ten years at 4 per cent. *July.* Kelly Bros. voluntarily made working time on Saturday eight hours without reduction of pay. — Factory of J. H. Winchell & Co. shut down indefinitely. — Firm of Jennings, Friedman, & Stevens, shoes, dissolved; Jennings & Stevens to continue manufacturing in New Hampshire. — Ira F. Twombly, heel manufacturer, died. — Building occupied by J. H. Durgin & Son and J. W. Greenlay & Sons, shoes, damaged by fire. *August.* Portion of Gale Bros.' factory leased by N. F. Gorman. — Gale Bros. gave notice to owners of their factory that they would vacate November 1 and occupy new factory erected for them in New Hampshire. — Factory of J. H. Winchell & Co. started up. — Hodgdon & Sargent removed to new quarters in the Hoyt, Dow, & Kennedy building. — Newton G. Miles, heels, died. *September:* Smith & Bixby sold out heeling department to Walter Fay. — Jennings & Stevens, shoes, removed to Epping, N. H. *October.* N. F. Gorman removed to block of Gale Shoe Manufacturing Co.; the five floors vacated by him leased by F. E. Hutchins. — Stock and machinery of W. W. Spaulding, shoes, damaged by water from faucet left open all night. — New last factory operated by Perry G. Savels & Co. *November.* New Hampshire factory of J. H. Winchell & Co. shut down not to be used as a shoe factory again. — W. F. Chase & Co., shoe manufacturers, dissolved; business continued by F. B. Hall. — Charles J. Twombly & Co. who succeeded J. F. Twombly added hard shanks to heel manufacturing business. — Work resumed at factory of Field, Thayer, & Co. which was shut down two days to take account of stock. — Blake Bros. shut down portion of factory while taking account of stock. — Emery & Holmes, shoes, removed from Taunton and occupied quarters in the new Thom shoe factory. — J. H. Winchell & Co. shut down temporarily. — Appleton & Tuck leased portion of shoe factory vacated by Gale Bros. — S. Prescott Bradley and Edward T. Merrill, shoe manufacturers, died. — Perry Messenger & Co., novelty woodworkers, and John N. B. Green, boxes, damaged by fire. *December.* New heel factory completed to be occupied by Day & Waldo. — Shoe shipments from Haverhill for 1891 were 307,585 cases as against 319,196 for 1890; a decrease of 11,611 cases, or 3.63 per cent. — H. Davis & Co., slipper manufacturer, of Kennebunk, Me., began moving plant to Haverhill. — Since January 1, 1891, there have been erected 181 wooden structures of which 15 were for stores or shops, the remainder being dwelling houses or tenements. Eight brick buildings built, five for mercantile purposes, one for a warehouse, one for a factory, and one for electric power station. One iron warehouse and two churches have been built. The total construction for the year is 192. The number erected in 1890 was 236.

**Hingham.** In February, William C. Wilder of the firm of Crocker, Wilder, & Son, woodenware, died.

**Hinsdale.** In March, T. F. Pyn rented part of Plunkett Wool Co.'s mill for the manufacture of woollen yarn. *June.* Hinsdale Bros.' woollen mill shut down for repairs.

**Holbrook.** In June, factory of Thomas White & Co. started up after a shutdown of three weeks. — Factory of Whitcomb & Paine closed indefinitely; dull trade. *July.* Factory of Edmund White started up after a week's shutdown. *October.* Factory of Whitcomb & Paine started up in full. *November.* E. Wales Thayer, shoe manufacturer, died. — Shoe factory of Thomas White & Co. damaged by fire. *December.* J. W. Porter & Co. retired from business. — Shoe shipments for the year were 61,902 cases as against 76,902 in 1890, a decrease of 15,000 cases, or 19.51 per cent.

**Holliston.** In November, new shoe factory of the I. A. Beals Co. dedicated and machinery set up. *December.* Ewing Bros. renewed lease of Holliston Blanket Mill for five years; mill closed two weeks to take account of stock.

**Holyoke.** In January, B. F. Nichols Belting Co. incorporated; capital stock \$40,000. — Plush mill of Chadwick & Chadwick shut down indefinitely. — A company known as C. H. Bellamy Marbled Paper Co., formed to manufacture marble paper under new process. — Winona Paper Co. shut down indefinitely. *February.* Plush mill of Chadwick & Chadwick sold to syndicate. — The Franklin Paper Co. shut down for a few weeks during the placing of machinery in new addition. — Nonotuck Paper Mill idle on account of break in water wheel. — Parsons Paper Co. put in new perfecting machines and introduced a new specialty in the form of buff sermon paper. — Machinery for new addition to mill of the Connecticut River Paper Co. set up. *March.* Machinery moved into new mill of Farr Alpaca Co. — Portion of Chadwick Mill started up; product to be plush for lap robes and cheap furniture covering; capital stock of the new company is \$25,000. — Deane Steam Pump Co. moved into new establishment and business started up in full. The plant consists of five brick buildings, the first of which, 50 by 80 feet, is used for offices and also contains the drafting room; it is connected by means of a bridge to the pattern store house, 106 x 38 feet, three stories high. Another building, 177 x 34 feet, contains testing room, boiler room with two 80 horse power boilers, engine room and blacksmith shop. In the rear of these buildings is a large foundry, 194 x 76 feet, two stories high. The main machine shop is 259 x 80 feet, two stories high. All these buildings are supplied with private tracks, and machinery can be started from the foundry and by means of turn tables switched through the yard directly into the machine shop near the lathes and planers. — The Chemical, Newton, and Excelsior paper mills obliged to shut down on account of high water; it rose two feet in twelve hours and backed up into raceways so as to interfere with water wheels. — Contract given for a new building for the Lyman Mills Corporation; to be 84 x 150 feet, five stories high. *April.* Goddard Machine Co. sold to H. O. Sorkness and Radford Stockbridge of Worcester, for the manufacture of machinery and machine tools. — A 1,200 horse power plant for the Holyoke Electric Light Co. completed by D. F. Coghlan, machinist and boiler maker. — The work of bricklaying begun on new Lyman Mill. — New time schedule adopted at the Merrick Thread Mills; hours arranged so as to permit half holiday on Saturday. — New boiler shop started at Holyoke by the firm of Long & Walsh. — Goddard Machine Co. put in new milling machine, new lathes, and other machinery. — Landers Bros. begun work on new building for the Farr Alpaca Co., to be 150 x 24 feet, and used as a warp dyeing department. — Hampden Glazed Paper Co. made improvements at its South Holyoke mills. — Holyoke Envelope Co. began on new schedule of time; the works to start at 7 A.M. and Saturday to be half holiday. — Oil tanks which supplied the furnaces of the Farr Alpaca Co. taken out, it being found less expensive to use coal. — David F. Coghlan, steam boiler manufacturer, died, aged 62 years. *May.* New machinery put in by the Albion Paper Co. — Whitmore Manufacturing Co., paper, shut down on account of breaking of a pulley. — Improvements begun on consolidated plants of the Crocker Manufacturing Co. and the Dickinson & Clark mill; two new penstocks, 10 and 7 feet, respectively, put in, and new finishing room 175 x 45 feet built. New head gates to be put in during the July shutdown and a large water wheel to be substituted for three small ones in use at present. — Worthington Paper Co. incorporated. — Manufacture of emery grinding machines begun by Horton Machine Co. — Norman Paper Co. incorporated; capital stock, \$200,000. Work on new buildings begun on following plan: Four water trunks, three of 9½ feet diameter and one of 7½ feet; the dam to have a fall of 12 feet; three 20-foot water courses, water being discharged from second to third level canal; four horizontal water wheels, two used for driving engines, one for calenders and one for finishing room. Engine room to be 300 x 50 feet with basement containing twelve washing engines, and a steam engine of 400 horse power to propel these engines in case of low water. The machine room to be 180 x 60 feet to accommodate two 80-inch Fourdrinier paper machines. The calender, finishing, and cutting rooms each to be 100 x 60 feet and rag sorting department to be 150 x 40 feet, three stories high. Boiler house to contain six steam boilers for heating and drying purposes. Two hundred and fifty hands to be employed. *June.* Mills of Winona Paper Co. sold at auction to Moses Newton of Holyoke who will organize new company and put mills into operation. — The weave room shaft of the Lyman Mills broke and work temporarily stopped. — William Skinner Manufacturing Co., silk, shut down two weeks for repairs. *July.* Horton Machine Co. added new machinery to plant and increased number of employes. — Operations begun at mill of Winona Paper Co. by new organization known as Chemical Paper Co., No. 2. — Germania Mills started up after two weeks' shutdown. — The Keating Wheel Co. incorporated under laws of State of Maine; capital stock \$200,000. The business at Westfield to be conducted at full capacity until new factory is completed at Holyoke when entire plant will be transferred to this city. — William Skinner Manufacturing Co.'s silk mill started up on full time. *August.* Hampden Envelope Co. petitioned Supreme Court for dissolution. — Work on the new Keating Wheel factory begun. — F. F. Carpenter leased leather-board mill at Westbrook, for manufacture of tissue paper. Firm to be known as

**Westbrook Paper Co.**—Beebe & Webber shut down for repairs.—Watson Ely & Son moved into new factory. *September.* Portion of the looms at the Beebe & Webber mill stopped: dull trade.—D. Mackintosh & Son Co. enlarged plant by erection of new building 114 x 30 feet.—Connecticut River Lumber Co. started up after two weeks' shutdown.—Germania Mills started on winter time schedule. *October.* On account of an insufficient supply of water following mills run on short time: Lyman Mills, D. Mackintosh & Son Co., Parsons Mill No. 2, and G. R. Dickinson Mill.—Addition to Farr Alpaca Co.'s dye-house completed and occupied.—Finishing department of Parsons Paper Co. Mill No. 1 shut down to put in new machine. *November.* New brick addition, 178 x 45 feet, occupied by Crocker Manufacturing Co.—The Coburn Trolley Track Co. leased building formerly occupied by Deane Steam Pump Co.—Work begun on addition to plant of Holyoke Machine Co., 50 x 150 feet, two stories high.—Owing to rapid fall of water Holyoke Water Power Co. restricted its use to fifty per cent.—Connecticut River Manufacturing Co. shut down on account of broken shaft.—Paper mill of Syms & Dudley purchased by Nonotuck Paper Co. *December.* Improvements made at Lyman Mills; buildings were pushed as far as the old walls and filled with machinery. The old buildings to be removed and an extension 160 x 100 feet built. The water power increased to 400 horse power.—An artesian well put into the mill yard of the Valley Paper Co.—Brick drug house three stories high built by D. Mackintosh & Son Co.—Keating Wheel Co. began moving machinery into the new Whitcomb building.

**Hopedale.** In March, plant of Hopedale Elastic Fabric Co. purchased by W. F. Draper and started up in full; property consists of brick mill, 265 x 50 feet, three stories high, six two-tenement houses, 260 square rods of land, all machinery, electric light plant, together with all manufactured goods and stock on hand in mill and dye-house. *July.* Hopedale Machine Co. began brick addition to old shop 60 x 40 feet; also two story shop erected, 100 x 160 feet, for new machinery.—The Elastic Fabric Mill shut down one week; started up again in full in August.

**Hopkinton.** In December, William's box mill closed on account of dull trade.—N. P. Coburn retired from business and partnership existing between Claflin, Coburn, & Co. dissolved; the consequent changes in management, to take effect January 1, 1892, are as follows: Factory at South Framingham to be conducted under the firm name of Gregory, Shaw, & Co.; factory at Hopkinton under the name of Crooks, Root, & Co., and the A. Coburn factory at Hopkinton conducted under the firm name of Coburn, Gauss, & Co.

**Hubbardston.** In March, the lock-corner box department of the H. W. Howe mill purchased by W. H. Kendall and Frank J. Blood; possession taken April 1, and business carried on as W. H. Kendall & Co. *September.* Howe's lumber mill damaged by fire.

**Hudson.** In April, Hobbs Manufacturing Co. of Boston leased the plant of the Woodward Manufacturing Co. for the production of shoe and box machinery. *October.* Hobbs Manufacturing Co. decided to remove entire plant to Worcester and occupy establishment recently vacated by Vail Chair Co.—Shoe factory of Carter & Tate sold at auction; to be occupied by A. P. Martin & Co. for the manufacture of shoes. *December.* Factory of A. P. Martin & Co. shut down.—New looms added to elastic webbing mill of Thomas Taylor.

**Ipswich.** In January, Farley & Daniel's shoe factory shut down for two weeks. *August.* The Ipswich Mills shut down for ten days.

**Kingston.** In November, new machinery put into factory of C. Drew & Co.—Factory of E. Hurd & Co. shut down owing to lack of water.

**Lancaster.** In January, shoddy mill of F. Simester burned.

**Lawrence.** In January, Pacific Mills began re-arrangement of machinery to make room for new spinning equipment for the manufacture of fine worsted yarn.—New spinning machinery and looms added to plants of Washington and Arlington Mills; additional persons employed as fast as machinery could be operated. *February.* Slight fire occurred in the Lawrence Duck Mill.—Burnham & Page, leather, completed for Arlington Mills a belt 225 feet long, 40 inches wide. *March.* Collins Bros.' broom factory damaged by fire.—Atlantic Mills gave trial to new pattern revolving top flat card.—Pemberton Mills increased wages of operatives in spinning department.—Arlington Mills notified weavers of 12 per cent reduction in wages.—Many mills obliged to shut down certain departments owing to high water in Merrimack River, the

back water stopping the wheels. *April.* Emerson Manufacturing Co. enlarged its machine shop. — Atlantic Mills introduced a new "purifier" for purpose of purifying drinking water for its employes; 100 new wide looms for weaving seamless sheets also put in. — Republic Mills dissolved by order of Superior Court. — Washington Mills gave up manufacture of ladies' suitings for purpose of devoting plant to manufacture of men's goods and woollen and worsted yarn. — Brown & Ackroyd formed partnership for manufacture of woollen dress goods; thirty looms put in to start with. *July.* Pemberton Mills shut down for three weeks for purpose of putting in new water wheels. *August.* Shareholders of Washington Mills Co. voted to pay in new capital to amount of \$1,015,000. — Russell Paper Co. added new 100 horse power engine to plant. *November.* New machinery put into Faulkner Mill by M. F. Hartley of Boston, to be used as a wool scouring establishment and operated by Hartley Wool Scouring Co. — Improvements made at Arlington Mill and boilers covered with fireproof protector. — Merrimack Valley Felt & Woollen Co. suspended operations. *December.* Work begun on foundry and machine shop by E. W. Barton for manufacture of paper mill machinery. — Lower Pacific Mills added 300 new looms. — The Wright Manufacturing Co. shut down indefinitely: dull trade. — New engine and boiler put into works of Fred Byron, successor to James Byron, brass founder. — Spinning and weaving rooms of Arlington Mills shut down on account of prevalence of the grip among operatives. — The Pacific, Arlington, Atlantic, Washington, Pemberton, and Everett Mills and Lawrence Duck Co. shut down for Christmas holidays.

**Lee.** In February, Arabian Food Co. leased Decker Paper Mill for manufacture of food. — E. P. Tanner's machine shop shut down indefinitely. *March.* Housatonic Paper Mill sold to W. H. Eaton of New Haven, Conn. *May.* Morley Paper Co. purchased the May & Morin paper mill and began reconstruction of plant. *June.* Clark & Spencer purchased machine shop and foundry of E. P. Tanner, closed since January, and began operations. *August.* Gross Bros., stone, started with full force after five days' shutdown. — Eagle Paper Mill shut down for repairs; new stock of calendars were placed and a new wheel-case built in flume. *September.* Finishing and store sheds of Gross Bros.' marble quarry damaged by fire. *October.* Work of moving debris begun at quarry of Gross Bros. preparatory to reconstructing plant with increased facilities. — Boiler and engine added to shops of Thistle Wire Co. *November.* Morley Paper Co. shut down mill at East Lee on account of low water; advantage taken of shutdown to put in new steam engine. *December.* Housatonic Mill started manufacturing paper under firm name of Eaton, Dikeman, & Co. — Additions and improvements made to the following manufacturing plants during 1891: Gross Bros.' saw mill, Pray & Sons' marble works, Smith Paper Co.'s Valley Mill, Columbia and Eagle Mills, Housatonic Mill, Clark & Spencer's machine works, Morley Paper Co., and Thistle Wire Co.

**Leicester.** In January, Lakeside Manufacturing Co., private firm, incorporated; capital stock, \$30,000. *February.* J. & J. Murdock, card clothing, resumed operations after four weeks' shutdown. *July.* E. G. Carlton & Son's mill started up after a two months' shutdown, during which time a new water wheel and new looms were put in. — George W. Olney's woollen mill at Cherry Valley shut down for improvements and repairs.

**Leominster.** In February, fire damaged machine shop of John Mather, button factory of Herbert Davis, and works of Willard Screen Plate Co. *March.* E. M. Rockwell, woollen goods, added several new sets of cards and discarded weaving plant, intending to manufacture yarn exclusively. Wool drying machines and an electric light plant also introduced. During July a tower was built in which the stairs were placed, thus gaining more factory room. *September.* Smith & Baker purchased plant of American Boot and Shoe Co., Stoneham, and removed to that town in October. *October.* Improvements made to plant of Wheelwright Paper Co. — W. S. Reed Toy Co. purchased Leominster Furniture Co.'s plant, to which portion of their business was removed. — Leominster Piano Case Co. retired from business.

**Lexington.** In March, Lexington Print Works changed from private firm to corporation, with capital stock of \$25,000.

**Littleton.** During January, Avery Lactate Co. completed repairs on factory.

**Lowell.** In January, experiment made in Tremont and Suffolk Mills of burning petroleum for fuel. — White Bros. & Co., tanners, reduced employes to three-quarters time. — Fire damaged Hamilton Print Works. — Lamson Store Service Co. shut down two weeks for repairs. — Fires kindled for first time in furnace of new foundry of Doherty Bros. *February.* American Bobbin, Spool, & Shuttle Co. purchased business of J. L. Cheney & Co. —

White Bros. & Co., tanners, began running on full time again. — Samuel L. Butman, harnesses, died, aged 59 years. *March.* Massachusetts Mills began running nights, and picker rooms of Boott Mills and Lawrence Manufacturing Co. ran overtime. — Whittier Cotton Mills ran entire plant evenings until ten o'clock. — Engraving department and print works of Merrimack Manufacturing Co. shut down temporarily, owing to overstocked market. — Lowell Machine Shop completed contracts for 150 looms for Massachusetts Mills and 100 for Boott Mills. — High water affected several mills, causing operatives to work nights to keep up with orders. — Main shaft of Boott Mills broke and portion of the operatives temporarily idle. — Saturday half holiday went into force at Merrimack Print Works, beginning a month earlier than usual. — Alvin Marshall, furniture, died, aged 76 years. — W. P. Edwards, iron castings, sold out; foundry partially destroyed by fire in April, and re-purchased by Edwards in November; repairs made and business resumed. *April.* By purchase of Coburn Shuttle Co. the American Bobbin, Spool, & Shuttle Co. secured building leased by Pickering Knitting Co. who were notified to vacate. Latter company shortly after began construction of new brick mill, 168 x 50 feet, four stories high. — Four printing machines at Merrimack Manufacturing Co. stopped on account of dull market. — Fire damaged cotton mill of John M. Pevey. — Following notice posted in various mills: "Weavers who carelessly or wilfully make imperfect cloth may expect to be discharged without notice at the discretion of the overseer." — Several looms in Lawrence Mills discontinued running; hosiery department increased. — White Bros. & Co., tanners, introduced novelty in leather, having a number of hides printed on calico machines. — J. L. Jacques of J. S. Jacques & Co., shuttles, died. *May.* Howard Stocking Co. moved into larger quarters. — Massachusetts Mills began foundation for new mill. — Tremont & Suffolk Mills put in number of new patent revolving flat cards. — New brick foundry of Atherton Machine Co., replacing one destroyed by fire, completed; main foundry 150 x 60 feet; brass foundry, 30 x 22 feet; core room, 30 x 22 feet; annealing room, 18 x 22 feet. — United States Bunting Co. increased motive power by two new 400 horse power water wheels. — Repairs made at foundry of Lowell Machine Shop. *June.* Crossley Manufacturing Co. removed to new mill erected at Barre. — United States Bunting Co. leased the Walsh Worsted Mills. Walsh leased another building and began manufacture of yarn as private individual. *July.* J. M. Stover, shoes, removed factory from Haverhill. — New mill of Pickering Knitting Co. completed. — Merrimack Manufacturing Co. began erection of three-story brick storehouse, 100 feet long. — Fire damaged color shop of Merrimack Manufacturing Co. — Faulkner and Middlesex Mills adopted new system of payment to weavers, cloth being divided into three grades. *August.* Richard Dobbin's boiler works destroyed by fire; as soon as insurance was adjusted work of rebuilding begun. — White Bros. & Co., tanners, began erection of additional factory 117 x 33 feet, four stories high. — A new concern called Eagle Foundry Co. began manufacture of iron and brass castings. — Addition to dye-house of Faulkner Mills begun. *September.* Board of trade closed contract with new firm for manufacture of worsted fabrics, to occupy the Coram building. *October.* Work begun at new slipper factory of Twombly, Rouleau, & Co. who removed from Haverhill. — Massachusetts Mohair Plush Co. incorporated, capital stock \$75,000, to manufacture furniture and car plush in the Coram building. — White Bros. & Co., tanners, occupied part of their new building. — Box factory of Frank P. Cheney damaged by fire. *November.* Hamilton Print Works shut down for two weeks. — Portion of plant of Wamesit Steam Mill Co. damaged by fire. *December.* Carload of cotton consigned to Massachusetts Cotton Mills damaged by fire. — New graded system of payment for weavers adopted by Massachusetts Cotton Mills. — S. L. Wagner, washing machines, died. — Moxie Nerve Food Co. sold all its business to Wm. Taylor & Co., retaining only its franchise in Maine; intention declared of closing out all its business as a corporation.

**Ludlow.** During June, preparations made by Ludlow Manufacturing Co., twine and bagging, for construction of new brick mill, 212 x 70 feet, four stories high in front, and six in rear.

**Lynn.** In January, Thomson-Houston Co. began putting machinery in new factory "L." — Chas. D. Pecker & Co., shoes, set cutters at work in new factory. — Chas. E. Blake & Co.'s shoe factory damaged by fire. *February.* New machine for carving wood, marble, or metal exhibited for first time by National Carving Co., an organization incorporated with capital stock of \$250,000. The machine is described as follows: Upon a standard rests an arm, at one end of which is the knife or carver, at the other end a guiding pin. This arm is so adjusted that as the pointer glides over any portion of the model it acts upon the knife in such a manner as to cut into the object to be carved the exact features of the model. Over and against the arm are two large plates of iron upon which, as before stated, are fastened the models and the blocks to be carved. These rotate in the same direction until the work is complete one

way; then the arm is moved so that the operation can be repeated in the opposite direction, to get features not touched the first way. The guide regulates the ploughing, and the knife or carver cuts only where it should. Work can be done on the carver from a cameo to life or heroic size, and anything carvable can be worked. — Chas. E. Blake & Co., shoes, resumed work in cutting and stitching departments. — Washington Boot & Shoe Co. decided to move to Nashua, N. H. — Work begun at shoe factory of G. W. Herrick & Co. — Riverview Shoe Manufacturing Co. formed, with capital stock of \$100,000. *March.* New rounding and edging machine set up in factory of A. M. & J. H. Preble, shoes. Machine is small, consisting of an upright, supporting a horizontal shaft, at either end of which are arranged cutters. On the left hand side is the sole rounding portion. Revolving on the shaft is a knife disc which is faced by a second revolving disc bearing a set of small rand knives as well as large cutting knives. This disc fits into a revolving cap which bears and forms a guard. By a screw treadle the width of the surface of exposed cutting knife is regulated. The soles, heavy outer or flexible inner, are held against these blades as they revolve, and trimmed down to the desired form. On the end of the horizontal shaft, at the right, is the portion for feather edging, a revolving disc, bearing an array of knives, so set as to turn out a beveled edge. By changing the knife head, the sole can be taken down in the shank, under the channel, an improvement on the old style of hand edging machine. This cutting head also fleshes the inners to an even thickness and leaves it ready for a welt or a turn. The machine also does sole cutting; the tin or zinc pattern which accompanies the last is taken, and on either side are placed wooden strips, following the outline of the pattern. The soles, one pair of heavy outer, or three or four pairs of flexible inner, are placed on this pattern. The projecting metallic edge acts as a guide, the soles are pressed against the revolving knives, and in this manner cut. Two persons can work on the machine, and it was stated that a man and boy could round out and feather-edge forty cases of flexible inner soles in a day. — New factory started by Bancroft & Frasier for the manufacture of pearl buttons. — G. A. & E. A. Mansfield, shoes, moved into new factory. — New machine for levelling soles placed in factories of G. W. Herrick & Co. and Placide Hebert. Claimed by inventor to save operatives the laborious part of levelling by taking the shoe and placing it under pressure, automatically, there to remain until another shoe is prepared, when by a pressure of the foot, the second shoe takes its place under pressure, the first being released and passed forward for the operator to remove. During the first two days in use it levelled thirty 60-pair cases a day. — A. B. Martin, Jr., of A. B. Martin & Co., shoes, died, aged 25 years. *April.* Mower & Son, shoes, shut down preparatory to change in firm. — The strike and lockout which began Aug. 12, 1890, ended by strikers voting to allow men to seek for work in any of the morocco manufactories except that of John T. Moulton. — Geo. F. Knowles & Co., shoes, sold business to J. R. Towle & Co. of Northwood Narrows, N. H., to which place machinery, etc., was moved. — Nichol & Bishop began manufacture of lasts in addition to soles and upper patterns. — H. Y. Emery, Murphy Bros., and Shillaber & Co., shoes, and A. B. Hoffman, leather, moved into new and enlarged quarters. — A. F. Smith, shoes, leased new factory in Haverhill and moved portion of plant; Lynn factory continued. — New machine for skiving heels finished and placed in factory of J. B. Renton. It occupies about the same amount of room as a sewing machine. An eight-inch cylinder, with four-inch face, is speeded to suit the convenience of the feeder, and at each revolution three heels have been placed on the cylinder face and carried to a stationary knife. The heel is carried backwards to the knife, and is firmly held by a nipper until a half-inch or three-quarter inch three-cornered portion of the heel is skived off. The heel then drops into a barrel and the skivings are conveyed to another receptacle. The machine is adjustable, and will skive a heel of any size. A feature of the new invention is the fact that if double heel stock is used on the machine a diagonal cut is made of the stock and two skived heels are manufactured without the slightest loss of material. The capacity was about 12,500 pair of heels per day, with one man or boy to operate. — Work begun upon new factory of Skinner & Scott, wheels, to be 131 x 60 feet, four stories high. — O. A. Phillips' machine needle factory destroyed by fire. — Amos T. Stocker retired from business. *May.* New factory for Harney Bros. begun. — Hand Method Finishing Machine Co. sold patent and plant to Reece Buttonhole Machine Co. of Boston. — Geo. E. Barnard Co. chartered for manufacture of boots and shoes; capital stock, \$200,000. — D. A. Donovan & Co., shoes, allowed employees Saturday half holiday until October 1, with pay. — Brown & Atherton, shoes, removed to new factory. — Fire damaged planing mill of A. J. Hall. — William A. Kelley, morocco, died, aged 71 years. — Balcom & Young started in business, manufacturing women's shoes. *June.* Tupper Shoe Co. succeeded to business of Lucy B. Tupper. — Varney & Hayes closed factory at Milton Mills, N. H., and removed to Lynn. — Williams, Plant, & Co., shoes, dissolved; Thos. G. Plant continued. A new factory leased and work begun at once. — Swain, Fuller, & Co., shoe machinery, incorporated as Swain-Fuller Manufacturing Co. — C. H. Damon, patterns, removed to larger quarters. — James Purinton died. He was one of the few who first intro-



duced machinery into the manufacture of boots and shoes in 1862. *July.* Thomson Electric Welding Co. closed for stock taking. — Jones, Curtis, & Towne, shoes, dissolved; business carried on by J. L. Towne & Co. — Thomas Bros. & Porter, shoes, dissolved. — Consolidated Adjustable Shoe Co. of Salem, began erection of factory, 73 x 106 feet, three stories high. — A. P. Legro & Co., shoes, discharged all employes and dissolved partnership. — Fires for the month: P. W. Cloran, cigars; John Carniff, shoes; A. P. Legro & Co., shoes; and Lovell & Eaton, shoes. *August.* Tripp Giant Leveler Co. purchased entire plant of Cutcheson & Johnson, and increased capital stock to \$160,000. — Hurley, Fenerty, & Co., shoes, dissolved. — H. G. Connor, shoes, moved into new factory, 75 x 125 feet, three stories high. — A. M. & J. H. Preble, shoes, took new quarters. — V. K. & A. H. Jones, shoes, closed factory at Hampton, N. H., and removed to Lynn. *September.* Harney Bros.' new shoe factory dedicated. — Nichol & Bishop, last manufacturers, dissolved; each continued alone. — Granite Shoe Co. organized for manufacture of women's shoes. — M. H. Whittridge, shoes, enlarged plant. — Dickinson, Caunt, & Co., shoes, dissolved; business continued by James Dickinson under old firm name. — William C. Wheeler, tacks, and L. B. Russell, treasurer of Russell Counter Co., died. *October.* Davis Shoe Co. succeeded by new corporation called Davis Boot & Shoe Co. — The business of Houghton & Godfrey, shoe manufacturers' supplies, continued by F. H. Houghton. — The Thomson-Houston Electric Co. began running on winter time schedule. — Hupper & Hudson, shoe racks, dissolved; E. A. Hupper continued. — Business of C. M. Howard, shoes, organized into a stock company and incorporated with capital stock of \$20,000 as Granite Shoe Co. This company absorbed the business of V. K. & A. H. Jones. — New factory of the Consolidated Adjustable Shoe Co. occupied and business moved from Salem where it had been carried on since the fire in 1889. — Sawyer & Chase, carriages, reduced wages of employes and the working time from ten hours to nine: dull trade. — W. E. Blanchard & Co., shoes, established in Lynn. — A. P. Legro & Co., shoes, re-commenced manufacturing at old factory recently vacated by Harney Bros. — Benjamin H. Dorman, shoes, died, aged 53 years. *November.* John B. Earp admitted to firm of F. A. Kollock & Logan, shoes; new firm known as Kollock, Logan & Co. — Charles B. Tebbetts, shoes, moved to Lynn from Seabrook, N. H. — Factory of J. C. Bennett, at West Lynn, leased by Hoag & Heath, shoes, who removed from Newburyport. — American Shoe Co. succeeded by Brophy Bros. Shoe Co. — National Electric Brush Co. incorporated; capital stock, \$500,000. — Ober & Walker leased portion of Strout's block for manufacture of women's shoes. *December.* Branch of Boston Welt Machine Co. organized to carry on business as the European Welt and Turn Machine Co. — A new portable milling machine designed by one of the foremen of the Thomson-Houston Co. to face up the castings of generators is described as follows: A circular disc revolves upon a spindle, its outer edge being supplied with tools to do the cutting; an inner disc revolves on another spindle so arranged that it goes 120 times a minute, while the outer tools are revolving but ten, the proportion being the same owing to the reduced diameter of the inner disc. This tool is suspended on the inner side of the castings and is said to accomplish in five hours the work done on a planer in four days. — Shoe factories shut down for Christmas holidays. — M. F. Hutchings & Co. started manufacture of shoe tips and leather remnants. — Firm of Corcoran, Callahan, & Co., shoes, dissolved. — Charles F. Coffin, shoes, died, aged 72 years.

**Lynnfield.** In February, Henry Law, shoes, closed factory owing to accident to machinery.

**Malden.** In March, John Collins began erection of building to be occupied as knitting factory. *April.* Tate & Co., picture cord, added to its business the manufacture of window cord. — Boston Rubber Shoe Co. shut down for stock taking and repairs. *May.* Fire damaged varnish works of Howard H. Paul. *September.* Goulding Waste Factory leased to J. H. Lind, formerly superintendent at the Cochran Carpet Mills, for manufacture of carriage carpets. — Sandpaper factory at Edgeworth started up. *October.* W. H. Farnham, last manufacturer at Stoneham, formed a copartnership with George W. Badger and moved to this city; business to be conducted under the style of Boston Last Co.; manufacturing begun in November. *December.* Massachusetts Wire Co. organized with capital stock of \$25,000, to draw and cover all kinds of magnet or other wire.

**Mansfield.** In February, new 75 horse power engine set up in Chilson Stove Foundry. *August.* Hat factory of Comey & Co. damaged by fire.

**Marblehead.** In January, shoe factory and equipment of late J. H. Orne sold. — Seavey & Williams succeeded to shoe business of Wm. H. Day. — Franklin Millett, shoes, shut down for

week, and Eben F. Richardson & Co., shoes, suspended operations indefinitely. *March.* The Harris factory building repaired and new shafting put in preparatory to being occupied as shoe factory. — Merrill & Tucker made additions to shoe factory, increasing capacity. — Titus Bros., shoes, built a third story addition to factory. — F. A. Parker & Co., shoes, began work on addition to factory. *April.* Russell Chase began manufacture of shoes. — R. B. Harris moved his shoe manufacturing business from Salem and occupied the old Harris factory vacated by F. W. Breed in 1890. — The Sparhawk shoe factory sold. *May.* Frank Mitchell began manufacture of shoes. *July.* I. M. Munroe began manufacture of shoes. — Wm. E. Brown, 2d, Geo. Hooper, 2d, J. B. & W. T. Litchman, shoes, shut down factories for one week. *August.* Chadwell Tucker occupied part of Parker's new shoe factory. *September.* F. Hooper erected small shoe factory. *October.* E. W. & E. F. Mower moved from Salem into new shoe factory here. *November.* John Lancy, Jr. and I. M. Monroe, shoe manufacturers, moved into new factory of the Building Association; Robert Vernon moved into quarters formerly occupied by J. Lancy, Jr.; and H. Millett Shoe Co. moved into a portion of the Mower factory.

**Marlborough.** In January, Germania Electric Co. purchased shop occupied by Commonwealth Shoe & Leather Co. which removed to Whitman. *February.* Wood & Willard, shoe machinery, etc., erected new building, 87 x 50 feet, four stories high. *May.* Shoe factory of John O'Connell & Sons partially destroyed by fire. *June.* Work begun on new factory for John O'Connell & Sons, 167 x 47 feet, four stories high, to be equipped with automatic sprinklers; factory completed in October. *July.* S. F. Draper and F. T. Meagher formed partnership and began manufacturing under firm name of Marlborough Die Co. *December.* Factory of J. B. Billings shut down for repairs to engine.

**Mattapoisett.** In June, Bay State Chair Co. decided to move its plant to New Bedford.

**Medford.** In July, William C. Child, veteran sheepskin tanner, died, aged 69 years.

**Medway.** In April, dye-house of Sanford Woollen Mills leased and work started under title of Medway Dye Works. *May.* Box factory of Samuel G. Clark destroyed by fire. *September.* Glenark Knitting Co. which had been using the dye-house of the woollen mill, removed that branch of the business to its Woonsocket, R. I., mill. *October.* J. W. Thompson & Son removed all machinery to their factory in Millis. *December.* Work at the New England Awl Factory resumed.

**Melrose.** In December, Charles Whitcomb started slipper factory at the Highlands.

**Merrimac.** In December, carriage body manufactory of Gilman S. Hoyt destroyed by fire.

**Methuen.** In February, Tenney's hat factory started up after being shut down nearly all winter. *October.* Knitted Fabrics Co. added new branch to industry, that of knitting a coarse silk towelling for use in factories for cleaning machinery, etc. — Methuen Co. ran quarter time on account of low water. — Wool hat factory of James Ingalls shut down for season on account of dull trade. *November.* Methuen Co. started operations on new chimney, 11 feet square and about 100 feet high, with a boiler capacity of 600 horse power. — New hosiery machinery put into mill of Knitted Fabrics Co. — The old plant of Methuen Woollen Mill utilized as an electric power station for manufacture of electric light. *December.* Methuen Woollen Mill shut down on account of low water.

**Middleborough.** In January, shoe factories of Keith & Pratt and Hammond & Richmond shut down for repairs and stock taking. — Fire damaged box factory of Chas. N. Atwood. *February.* Main shaft at Witham's mill broke, causing four days' shutdown. *April.* Shaw, Keith, & Co., shoes, leased new factory. *May.* Foundry of Cochran-Grove Co. shut down on account of refusal of moulders to accept reduction in wages. *November.* Improvements made in machine shop of Lloyd Perkins. — Murdock Parlor Grade Co. added nickel, copper, and brass plants to its factory. — Le Baron Foundry Co. added new japanning house to plant. — Clark & Cole, boot, shoe, and packing boxes, added two-story building to plant. — W. H. Schlueter, fancy articles, moved into new factory.

**Middlefield.** In September, Church Mills Knitting Co., capital stock \$40,000, organized; charter granted August 6.

**Middleton.** In July, Middleton Paper Mills shut down for repairs and setting up of new steam engine.

**Milford.** In January, Ponemah Granite Quarry and Manufacturing Co., capital stock \$50,000, filed articles of incorporation. *April.* Excelsior Cement Co. began manufacture of blacking. — New blacksmith shop, a stone-cutters' shed, and a 20-foot extension to office built at Darling Bros.' quarries. *May.* Fire damaged shops of J. L. Buxton, machinists' work; Eben Brown, machine needles; and Ellis & Sons, tin-smithing. *July.* New shoe factory begun, 203 x 35 feet, three stories and basement, with front projection for office 25 x 35 feet. — Excelsior Shoe Co. incorporated; capital stock \$10,000. — Milford Business Men's Association accepted proposition of Houghton, Coolidge, & Co., shoes, of Ashland, in regard to locating here; new factory to be built for firm 400 feet long, four stories high. *August.* Excelsior Shoe Co. began work in cutting room and turned out the first shoes on the 29th. *October.* The Johnson & Rust shoe factory occupied by United States Nozzle and Coupling Co. of Syracuse, N. Y. — Nute Bros.' Shoe Co. of Auburn, Me., leased Claflin factory for manufacture of boots and shoes. — Excelsior Cement Co. purchased Estabrook & Wires' old factory, part of which it already occupied. — The agreement between the subscribers' committee of Milford, and Clapp, Huckins, & Temple, successors of Houghton, Coolidge, & Co., Boston, signed; this agreement binds firm to locate its shoe manufacturing business here and under conditions to conduct certain minimum amount of business; at the end of five years, the conditions being fulfilled, the firm to own the factory. — Glazier Twin Point Co. organized for the manufacture of glazier twin points. — Excelsior Shoe Co. started up after brief shutdown. *November.* The J. S. Kelley factory started up under the direction of assignee. — Appleton Bragg, one of the earliest boot manufacturers, died in Braggville, aged 86 years.

**Millbury.** In February, operations at Atlanta Mills closed indefinitely. — C. T. Aldrich built new storehouse in mill yard, 20 x 60 feet, skeleton frame, with sides and roof of corrugated iron. *March.* Stonemetz Printers' Machine Co. converted blacksmith shop into a foundry and moved blacksmithing into boiler room. *April.* Work resumed in carding and spinning rooms of Atlanta Mill. *June.* Fire damaged picker room of Crane & Waters Manufacturing Co.'s mill. — John Rhodes Warp Co. organized as corporation; occupied plant of late John Rhodes. *July.* An addition, 20 x 30 feet, built on picker room of Windle Shoddy Mill. — Millbury Cotton Mills shut down for repairs. *August.* Whitney & Molt enlarged dye-house. *November.* Wheeler Cotton Mills shut down for an indefinite period. — John Rhodes Warp Co. ran on short time on account of dull trade. — Ruel Warfield, cotton manufacturer, died. *December.* M. A. Lapham leased Atlanta Mills, a four-set plant. — Hosiery Mill of Crane & Waters, which had been idle several weeks, announced to start up first week in January, 1892.

**Millis.** In May, new factory for Frank, Herman, & Co., shoes, completed; in form a hollow square, two sides being 200 feet and the other two 160 feet long; factory run under name of J. W. Thompson & Co. *June.* Baltimore Paper Mill, George Gardiner, lessee, manufacturing wrapping paper and carpet lining, burned. *July.* Inside finish of stamping works of Hollander, Bradshaw, & Folsom begun. *October.* J. W. Thompson & Co., removed all machinery from Medway to their factory in this town. *November.* The Novelty Mill moved from Barnet, Vt., to this town, where the firm has a much larger plant. — Four large buildings in process of erection to be occupied by the Steel Edge Stamping & Retinning Co. of Chelsea, who will remove entire plant.

**Monson.** In February, weavers in R. M. & T. Reynold's Woollen Mill left work, owing to dissatisfaction with new wage schedule. *April.* All workmen at Flynt Co.'s granite quarries discharged. — C. W. Holmes, retired woollen manufacturer, died. *August.* Gage & Reynolds dissolved; Miller & Reynolds succeeded. *September.* Helmann & Litchten made extensive repairs and improvements in their straw manufactory. *October.* D. W. Ellis & Sons shut down woollen mill to make repairs on steam plant. — S. F. Cushman & Sons' mill closed in order to make necessary improvements. *December.* C. R. Smith, harnesses, erected new building to accommodate growing business.

**Montague.** In January, L. G. Littlefield, shoes, removed to Brockton; the factory, which had been idle for a month, started up under new management. — Turners Falls Brick Co. purchased an estate of 100 acres and in the spring began manufacture of brick, leasing its old yard to other persons. *March.* Shawmut Manufacturing Co., leatherette, decided to remove

to Hingham. — Clark Machine Co. resumed operations. *April.* Portion of Turners Falls Shoe Co.'s factory shut down owing to dull business. — Montague Paper Co. put in new boilers and made other repairs. — Kindling wood shop of Turners Falls Lumber Co. and mill of New England Fibre Co. damaged by fire. *May.* Turners Falls Lumber Co. began rebuilding kindling wood mill. *June.* Turners Falls Shoe Co. closed factory for indefinite period. — Cutlery works shut down for annual inventory and vacation. *August.* Montague Paper Co. and Turners Falls Paper Co. shut down for week. *November.* Montague Mill Co. increased value of plant over \$50,000 during the past year. *December.* Work begun on new saw mill for Ward & Lewis.

**Natick.** In January, new shoe factory built by Frank Bigelow & Co. dedicated. *February.* Waltham Electric Clock Co. moved plant to this town. *May.* J. O. Wilson & Co., shoes, notified employes that unless prices were arranged upon the same basis as those ruling in Dover (N. H.), Marlborough, or Pepperell the firm would move. *July.* Swain, Moulton, & Loker began manufacture of shoes. — N. Bartlett & Sons, shoes, shut down for one week. *October.* Brennan & Hanchett, shoes, moved into new factory.

**New Bedford.** In January, Wamsutta Mills shut down, removed old boilers and put up new ones, besides adding new machinery. — Main belt in mule room at Potomaka Mill broke, causing both mule and spinning rooms to shut down. — J. C. Rhodes & Co., shoe eyelets, factory at Whitman, purchased old Thayer & Judd factory and removed to this city. — Pairpoint Manufacturing Co., silversmiths, changed from nine-hour time to full time. — Tinkham & Gifford shut down for two weeks during which repairs were made. *February.* Wide loom weavers at Wamsutta Mills left and secured work on other and narrower looms in the other mills. — H. C. Hathaway moved into factory of J. R. Forbes & Co. and began manufacture of carriages. — A number of looms idle in Grinnell Mills owing to lack of filling. — Old Colony Novelty Manufacturing Co. organized for manufacturing barbers' appliances, etc. *March.* J. S. Allen began manufacture of harnesses; motive power furnished by oil engine, first of kind in city. — Work begun on new factory for Pairpoint Manufacturing Co., to be of brick, 260 x 40 feet, four stories high. — Owing to slack trade cutters at Hathaway, Soule, & Harrington's shoe factory placed on eight-hour time. — Pope's Island Manufacturing Co. added horse bits, made from its new process metal, to its product. — Smith Bros., glass decorators, reduced working time from 9½ to 9 hours. *April.* A two story addition, 100 x 96 feet, built on No. 2 mill of Howland Mills. — Stockholders of American Tack Co. authorized directors to sell plant to Atlas Tack Corporation. — Fifty-eight looms idle at Acushnet Cotton Mill. — Wamsutta and Grinnell Mills decided to pay operatives by the hour. — Pope's Island Manufacturing Co. began running nights. — Wright Drug Co. incorporated. — Seven hundred bales of cotton, belonging to different mills of city, destroyed by fire in freight shed of Old Colony Steamboat Co. *May.* Hathaway Manufacturing Co. completed the erection, in its new mill, of stop-motion drawing frames, slubbing, intermediate, roving, and jack frames, and self-acting cotton mules. — City Manufacturing Co. completed new brick addition, 288 x 112 feet, three stories high, with picker room 112 x 40 feet, engine room 50 x 40 feet, and boiler room 60 x 30 feet. — Bennett Manufacturing Co. erected new four-story mill of brick, 324 x 100 feet, to accommodate 60,000 spindles. A reservoir, 275 x 225 feet, constructed west of new mill. — E. B. Chase & Co., picture frames, damaged by fire. *June.* A pulley in lower weave room of Hathaway Mill broke, stopping about 300 looms and throwing 40 weavers out of employment. — Pairpoint Manufacturing Co. shut down for a week's vacation. *July.* J. A. Jenney constructed new lighting and electric motor of his own invention; a company organized with capital stock of \$50,000 and the old Gifford foundry leased for its manufacture. — Pairpoint Manufacturing Co. established mill to make newly invented paper for wrapping silverware, which prevents tarnish; the manila paper was run through a chemical solution and over a dryer to the final rolls on which it was wound for use. *August.* A two-story addition built to the weave room of Hathaway Mills. — Directors of Acushnet Mills decided to build addition 70 feet long, the same width as present structure, and three stories high, on Mill No. 2, the object being to introduce machinery for diversifying products of the mill and add to the facilities of the card room. *September.* Pairpoint Manufacturing Co. shut down for week to make connections with new engine. — New heads placed on looms at Hathaway Mills. — Coleman Cotton Mills incorporated with capital stock of \$400,000. — About 180 looms idle at Potomaka Mill No. 2. — City Manufacturing Co. began erection of new building, 108 x 76 feet. *October.* Bennett Manufacturing Co. partially started up mill No. 2, producing cotton yarn. — Mill for manufacture of non-corrosive paper erected; some paper already prepared by hand processes. — Increase in wages granted on various grades of cotton goods in Wamsutta Mill No. 5. *November.* All rooms in new Bennett Mill, except mule room, in operation. — Additional

story built on weave room of Grinnell Manufacturing Co. — Wamsutta Mills introduced six new mules. — Three story addition to weave shed of Acushnet Mill completed. — City Manufacturing Co. completed new two-story brick mill containing 40,000 spindles and set up new engine of 100 horse power. — Fairpoint Manufacturing Co.'s new addition, 40 x 280 feet, completed. *December.* King Manufacturing Co. sold to L. J. Ullman of New York; business continued under local management. — Hathaway Mills introduced 240 new looms. — Repairs at Bennett Mill No. 2 completed and work resumed.

**Newburyport.** In January, Lithoid Co. shut down entirely; all machinery shipped to Newark, N. J., the headquarters of the celluloid trust; 100 men thrown out of employment. The facts in regard to this trust were published in the *CHRONOLOGY* of 1890. — N. D. Dodge Co., shoes, increased force of cutters. *February.* Dodge Bros., shoes, moved into new factory. *March.* Nathan D. Dodge & Son Shoe Co., capital stock \$25,000, incorporated. — Bayley Hat Co. shut down for repairs and stock taking; the fur department started up after five days and the wool department later. — Work begun on new addition to plant of E. P. Dodge Manufacturing Co., shoes. *April.* Newburyport Car Works enlarged plant by putting in new engine and boiler house. *May.* Water pipe burst in Burley & Usher's shoe factory, causing brief shutdown. — Standard Cloth Meter Co., capital stock \$10,000, incorporated. *July.* Wilder & Clark merged into Wilder & Clark Shoe Co.; capital stock \$40,000 — N. D. Dodge & Son Shoe Co. moved into new factory. — Hoag & Heath, shoes, succeeded to business of Hoag & Durgin. — Bayley Hat Co. shut down indefinitely. — Towle Manufacturing Co. closed factory for repairs and stock taking. *October.* Nathan D. Dodge & Son Shoe Co. increased its capital stock \$25,000. *December.* Bayley Hat Factory sold to W. B. Thom & Co. of Haverhill and New York.

**Newton.** In January, Sullivan Whitney, M. D., died, aged 83 years; he was first American doctor to manufacture homœopathic medicines. — E. J. Hickey of Hyde Park purchased Crandall Paper Mills to manufacture wall paper. *February.* Robert Bishop purchased the old Rice Paper Mill, July, 1890, and since that date built new machine room 80 x 160 feet, in which was placed an 84 inch machine; two new steam engines of 400 horse power added to plant, the product to be manilla paper. *March.* An artificial ice company organized with capital stock of \$100,000. — Sterling Elliott sold his business to Elliott Hickory Cycle Co. *April.* Old Thos. Rice Paper Co. to be known hereafter as National Paper Mills Co. *September.* R. T. Sullivan shut down woollen mill for two weeks for purpose of remodelling entire plant. *December.* Two new industries to be started at the Lower Falls after January; S. E. Morse will manufacture chemicals and Hobson Swallow will engage in extracting wool.

**North Adams.** In January, new machinery placed in Johnson Manufacturing Co.'s mill. — S. Blackinton Woollen Co. put in new drying and tentering machine. — W. G. Cady & Co. purchased new shoe factory which had been built in 1890 and never occupied. *February.* Phoenix flouring and grist mill of A. W. Hodges sold to Frank A. Walker. — Ground broken for foundation of extension of H. T. Cady's shoe factory; addition to be 40 x 100 feet, three stories high. — Freeman Print Works closed indefinitely. *March.* James Hunter & Son changed from private firm to corporation under title of James Hunter Machine Co.; capital stock \$50,000. *May.* Addition built to shoe factory of N. L. Millard, 70 feet long. Main shop closed on account of broken water main and to allow transfer of machinery into new part of factory. — Stockholders of Greylock Mills decided to erect new building 230 x 50 feet and add 250 new looms. *June.* James Hunter, president James Hunter Machine Co.; died, aged 85 years. — Geo. M. Mowbray, inventor of nitro-glycerine, died, aged 66 years. *July.* Erection of twenty tenements started to accommodate extra help employed at the recently enlarged Greylock Mills. — Mill of Johnson Manufacturing Co. slightly damaged by fire. *August.* Windsor Co. organized and incorporated under laws of New Jersey to carry on business at the old Freeman Print Works. *September.* New weave shed of Greylock Mills dedicated. *October.* Beaver Mill, which had been shut down two months for repairs, started up. — Ground broken by Johnson Manufacturing Co. for new dye-house, 40 x 100 feet. *November.* Windsor Co. started up the old Freeman Print Works; the opening celebrated by procession, speeches, and concert. *December.* Candy & Wilkinson, shoes, placed lasting machines in factory to take place of striking lasters. — Winslow Print Works ran both day and night to keep up with orders. — All looms removed from Greylock Mill No. 2 and spinning frames introduced in place.

**Northampton.** In January, several changes in machinery made at Nonotuck Silk Mill. *February.* Boston Cash Register Co. moved here and began manufacturing. — Connecticut River Manufacturing Co. started mills fifteen days earlier than in 1890. — Florence Manufactur-

ing Co. set up new 50 horse power engine. — Florence Machine Co. shut down for repairs. *April.* Brown & Bailey began manufacture of brick for the season. — William Skinner of Holyoke purchased interest in Warner Silk Mill, and mill operated by new firm of Skinner & Warner. — An important discovery made on local farm of vein of rock from which fire brick is made. — Employés of Florence Manufacturing Co. began work on summer time schedule. — Morley Paper Mill destroyed by fire; not to be rebuilt but business transferred to mill at Lee. *May.* Hill Machine Co. began erection of pattern house, 50 x 25 feet, 12 feet high. *June.* Hill Machine Co. reorganized with capital stock of \$100,000. From this company, also, the Ulrich Engine Co. was formed. *July.* Florence Machine Co. sold entire plant to Central Oilgas Stove Co. New company has capital stock of \$1,500,000 and absorbed, besides the Florence, the Monitor Oil Stove Co., Cleveland, Ohio; Union Gas & Oil Stove Co., Greenwich, Conn.; Grand Oil Stove Co., Jackson, Mich.; Hayward Foundry Co., Gardner, Mass.; and Emerson Power Scale Co. of this city. Manufacturing will be carried on only at Northampton and Gardner, Mass.; Greenwich, Conn.; and Jackson, Mich., with central offices at Northampton. — J. N. Leonard & Co., silk thread, etc., reorganized with capital stock of \$125,000 and the name of John N. Leonard Silk Co. was adopted. *August.* E. N. Foote & Co. abandoned manufacture of metal buttons, etc. — Caleb Loud Paper Mill, purchased by Buchanan & Bolt, for manufacture of Fourdrinier wire cloth. — Mt. Tom Sulphite Pulp Co. started after two years occupied in construction of mill. The plant has six boilers, 20 feet long, six inches in diameter, with 82 flues, four inches in diameter; there are two engines of 500 horse power each placed in the brick buildings of which the plant is comprised. A pump supplies the water and the washers have a capacity of about 2,000,000 gallons daily. It will require about one hundred cords of wood daily to run the mill, sixty being turned into pulp. This wood is brought to the cleaning room in cars; all weather stained surfaces are planed off, ends are cut off, and knots bored out of the middle of slabs or sawed out of the edges; from these the slabs are taken to the two chippers; they are circular discs, six feet in diameter, with eight knives set in their faces; they revolve perpendicularly, 250 times a minute and knives are changed three times daily. Wood is dumped into a pocket on the side of these discs as fast as one man can handle it. The chips fall on a canvas conveyer, are sifted and screened to get out the dirt and small particles, and thence drop at the opening of a blower which whisks them up 70 feet to the 60 cord bins over the digesters, of which there are four, two forty feet high and two fifteen feet in diameter, which revolve once in ten minutes. When cooked and the chips divested of starch and creosote the mass is emptied into vats made of cypress wood 18 feet in diameter and 10 feet high. From this the wet mush is pumped into the pumping tanks in another building whence it passes into a beating engine and from that into a double engine. The pulp then goes to the bleaching vats, thence to a tank with wire screens. Here the dirt and hard unseparated fibres are collected automatically and conveyed to a beating engine, while the first quality of fibre is carried to the machines where the water is taken out and the white fibres laid in sheets and cut off. *October.* Northampton Cutlery Co. ran plant but three days a week while putting in new water wheels. — Nonotuck Pocketbook Co., recently burned out at Deerfield, leased quarters in this city and began setting up machinery. *November.* Florence Tack Co. put new set of wire rollers into Horace Lamb & Co.'s wire mills. *December.* Mt. Tom Lumber Co. discontinued manufacture of laths. — Knitting department of Nonotuck Silk Co. shut down on account of overstock. — Whitney Safety Fire Arms Co. shut down for ten days.

**North Andover.** In December, Geo. L. Davis, founder of the Davis & Furber Machine Works, died, aged 75 years.

**North Attleborough.** In December, Walcott Manufacturing Co. removed to Providence, R. I.

**Northborough.** In August, satinet mills of E. W. Chapin & Co. shut down. *December.* E. W. Chapin Co. incorporated under Maine laws.

**Northbridge.** In January, fire damaged annealing and hardening building of the Spinning Ring Co. *April.* Ice houses of Earl Carpenter damaged by fire. *July.* Spinning Ring Co. began building addition to works.

**North Brookfield.** In January, cutting room of E. & A. H. Batcheller & Co. shut down for ten days. *March.* Brown Boot & Shoe Co. shut down one week to take account of stock. *December.* Alfred H. Batcheller, founder of firm of E. & A. H. Batcheller & Co., died at Dansville, N. Y., aged 61 years.

**Norton.** In January, building in course of construction for Norton Jewelry Co. blown to ground during gale. *April.* New factory of W. A. Sturdy Manufacturing Co. dedicated. *December.* Property of W. A. Sturdy Manufacturing Co. sold.

**Norwood.** In July, tanneries of Winslow Brothers shut down for an indefinite period, throwing nearly 1,000 persons out of employment.

**Orange.** In February, woollen and grist mills of Leonidas Allen destroyed by fire. *May.* New shoe factory of J. B. Reynolds dedicated. *July.* New Home Sewing Machine Co. began erection of additions to plant consisting of four story building, 250 x 50 feet; two story building, 106 x 50 feet; brick office, 60 x 50 feet; and annex to stables, 40 x 35 feet. An additional water wheel constructed and a new dam. — Potter & Co. broke ground for storehouse 150 x 30 feet, one story high. *October.* New box factory begun by J. W. Wheeler, 200 x 60 feet, two stories high, and a storehouse of same dimensions. — Annex to factory of New Home Sewing Machine Co. completed; output increased about 100 machines daily. *November.* A. L. Shattuck and F. R. Bolton, shoes, burned out.

**Oxford.** In July, two mills of John Chase & Sons closed for indefinite period. *October.* Satinet mill operated by Gillespie & Sullivan for John H. Lyon & Co., New York, destroyed by fire. *November.* Additional warp dressing machinery put in mill of E. Bartlett. — H. C. Putnam, boxes, leased factory to Putnam Bros who continued in same business. *December.* New machinery placed in mills of Acworth Manufacturing Co.

**Palmer.** In January, the dam at Smith's mill being repaired, Holden & Fuller's woollen mill resumed operations. — Main portion of dye-house of the Palmer Mills of the Otis Co. damaged by fire; two employes burned with the building. *March.* Plant of the old carpet company, which had been idle for past six months purchased by new company known as Palmer Carpet Manufacturing Co. *May.* Otis Co. began building new boiler house for Palmer Mills. *August.* Addition built to picker house of Mill No. 1, Thorndike Co. *September.* I. M. Eager began manufacture of shoes. *October.* Boston Duck Co. put in new yarn dyeing machines. On account of low water mill unable to run full time. *December.* During 1891 extensive alterations and additions made to plant of Otis Co.; 210 looms set up, making total number 900; a new steam plant of 1,000 horse power added; the dye-house enlarged and nearly all departments improved.

**Peabody.** In January, the Standard Thermometer Co. and tannery of Geo. J. Winchester & Son shut down temporarily on account of local floods. — Stephen Fernald, tanner, died, aged 82 years. *April.* Lennox & Co. leased additional buildings and fitted them with machinery. — Tannery of F. Osborn, Jr. & Co. shut down indefinitely. *June.* Moore & Pray dissolved partnership; business of morocco manufacturing continued by Walter Pray. — Geo. Foan's morocco factory, John O'Callaghan's currying shop, and Geo. J. Winchester & Son's tan house damaged by fire. *July.* Benj. N. Moore began manufacture of India tanned goat and sheep skins. *August.* Aulson & Mohan's dongola factory destroyed by fire. *September.* Factory of H. W. Moore, goat leather, started up after being shut down for nearly a year. *October.* Pottery of Moses B. Paige destroyed by fire. *December.* J. E. & J. H. Osborn, currying, leased new buildings in order to increase plant. — Standard Thermometer Co. added the manufacture of type writers to product.

**Pepperell.** In February, new factory of Leighton Bros. dedicated; it is double the size of the one destroyed by fire, "T" shaped, five stories and basement; it has a frontage of 152 feet and an ell extending 184 feet in rear.

**Pittsfield.** In January, D. M. Collins & Co., knit goods, began manufacture of paper boxes in which to ship product. — Martin Van Sicker, retired cotton manufacturer, died, aged 75 years. *February.* Stanley Electric Manufacturing Co. fitted up factory and began operations. *March.* Part of Bel Air Woollen Mills, idle since fall of 1890, leased and partially operated by Wilson & Horton of the Taconic Mills. — Directors of Pontoon Woollen Mill decided to build addition to plant 200 x 66 feet, to put in new water wheel, and equip mills with electric lights. *April.* David J. Gimlich & Geo. Fabricius formed partnership for manufacture of barbers' coats, butchers' frocks, etc. — Daniel Stearns, who started in the manufacture of broadcloth, satinet, and flannel in this city in 1826, died, aged 91 years. *May.* Fire

destroyed factory of Gimbleh & Fabricius. *June.* Addition, 60 x 30 feet, two stories high, built at W. E. Tillotson's cassimere factory. — Pittsfield Manufacturing Co. added to its plant special machinery for manufacturing merino yarn on small cops. *November.* Pittsfield Manufacturing Co. shut down for repairs and on account of low water. *December.* Mill of Z. A. Ward, recently destroyed by fire, rebuilt.

**Plymouth.** In January, the spool and bobbin factory, recently destroyed by fire, repaired and started up. *May.* Loring & Parks, tacks, etc., sold tack department to Atlas Tack Corporation, and in November sold the remaining part of business to same concern. *June.* Godfrey Seamless Pocket Co. built bleachery in rear of factory. *August.* Francis Emery, shoes, shut down indefinitely. *October.* Russell Mills shut down for repairs. *November.* Plymouth Rock Boot & Shoe Co. shut down permanently.

**Princeton.** In June, the annex to the chair factory of Reed & Temple, completed and occupied.

**Quincy.** In July, the factory of John E. Drake & Co., shoes, shut down, throwing out about 200 hands. *December.* Fire destroyed a shed occupied by the Quincy Granite Works, South Quincy.

**Randolph.** In July, Bryant, Case, & Co., shoes, succeeded by Bryant, Ochs, & Co. *November.* C. L. Ludlow, South Easton, started a shoe counter factory in this town. *December.* William O'Brien, shoe manufacturer, died, aged 36 years.

**Raynham.** In April, the tack factory of Charles B. Gardner (Diamon Tack and Nail Co.) destroyed by fire; plant to be rebuilt. *September.* Abbott & Hackett, shoes, shut down and removed to Michigan. *November.* Zeno H. Kelly's shoe shop started up after a shutdown of two weeks.

**Reading.** In May, Horton-Akerley Co., brushes, etc., incorporated with a capital stock of \$12,000. *September.* Kalloch Rubber Manufacturing Co., mackintoshes, consolidated with Rubber Manufacturing Co. *December.* Massachusetts Rubber Co. shut down indefinitely.

**Revere.** In November, the kiln shed in the brickyard of George Foster damaged by fire.

**Rockland.** In January, J. S. Turner, shoes, introduced new machines in factory for sewing on welts, doing away with hand welt sewing. *May.* French & Hall, shoes, succeeded by French & Hall Co. *July.* Ellison & Crowell, vamps, succeeded by J. F. Crowell & Co. — Charles E. Lane, shoes, built an addition 30 x 34 feet. *August.* H. D. Smith & Co.'s stocking factory started up after a long shutdown. *September.* F. E. Nesmith & Co., boxes, placed a box folding machine in factory to turn out 100,000 boxes daily. *November.* Chipman, Calley, & Co., shoes, added new machinery to factory.

**Rockport.** In February, Hockridge Bros. & Co. purchased the plant and business of Pingree's tool manufactory. — Cape Ann Isinglass Co. shut down owing to a break in the machinery.

**Royalston.** In January, an addition 100 x 40 feet added to Whitney Woollen Mill.

**Rowley.** In December, new machinery added to saw mill of N. N. Dummer.

**Salem.** In January, fire slightly damaged tannery of Patrick O'Keefe. *February.* New factory erected and occupied by Locke Bros., steam appliances, 106 x 40 feet, with wing 40 x 40 feet. — Kelsey Manufacturing Co. incorporated; capital stock \$5,000. — Charles Harrington & Co., leather, started up on full time. — Forest River Lead Mills completed and works started up. — Fire destroyed building occupied by E. H. Dixey & Co., C. L. Dockham, Sawyer & Flint, and J. F. Brady, shoes. — Fire partially destroyed paste and stiffening shop of Peter J. Marrin. *March.* Woodbury Heel Co. organized for manufacture of moulded counter stiffenings. *April.* Fire destroyed works of Salem Waste Co.; to be rebuilt. *May.* Hill & Donovan organized for manufacture of missees' shoes. — Association Factory No. 2 leased by E. S. Woodbury & Lefavour, shoes. *June.* B. E. Cole & Co., shoes, shut down owing to accident to boiler. *July.* Improvements made in Salem Foundry & Machine Shop. *August.* Glue factory added to tannery of Poor Bros. *September.* Frothingham & Hardiman, shoes, succeeded by A. G. Frothingham. — Consolidated Adjustable Shoe Co. moved from Salem to



new building at Lynn.—Fire damaged shoe shop of Dane, Grinnell, & Co. *October*. Winslow & Rogers' shoe factory sold to J. Frank Farrin.—David D. Lefavour succeeded to shoe business of E. S. Woodbury & Lefavour. *November*. H. F. Lord started in business for manufacture of misses and children's shoes.—New boilers put in Naumkeag Mills. *December*. Murphy & Gulley, shoes, succeeded by John Gulley.—Merrill & Weymouth, shoes, succeeded by J. E. Weymouth.

**Saugus.** In June, Harmon Hall, twenty years a shoe manufacturer, died. *August*. New machinery added by Franker Manufacturing Co.

**Seftuate.** In January, G. W. Bailey, shoe manufacturer, died, aged 60 years.

**Shelburne.** In February, Mayhew Silk Co. shut down indefinitely. *April*. Shirt factory started up with 27 hands. *June*. Lamson & Goodnow Manufacturing Co., cutlery, shut down for indefinite period. *August*. Lamson & Goodnow Manufacturing Co., cutlery, built addition of 40 feet to carpenter shop.—Cutlery plant of D. Rush & Sons started under firm name of New England Cutlery Works. *November*. Improvement made in cutlery plant of Lamson & Goodnow Manufacturing Co.

**Shirley.** In August, Mark McPheters built addition to veneer mill, 36 x 36 feet, three stories high.—Fire destroyed Monson Yarn Mill occupied by V. H. Vickery as cotton batting factory.—B. S. Binney's paper mill shut down on account of low water, remaining closed, except for repairs, until December. *October*. Fredonian Mills, cotton, shut down and for sale. *December*. Thirteen looms added to Shirley Manufacturing Co.'s plant.

**Somerset.** In January, stockholders of Somerset Potters Works voted to indorse formation of a new organization to be known as Somerset & Johnsonburg Manufacturing Co., capital stock \$400,000. Somerset business to be continued. *February*. Mount Hope Iron Works started up after a shutdown of a week. *March*. Somerset Shoe Factory and Mount Hope Iron Works shut down for few days. *July*. Somerset & Johnsonburg Manufacturing Co. extended works; a complete system for manufacture of enamelled bricks intended.—Somerset Co-operative Foundry voted to sell entire plant.—Mount Hope Iron Works and Somerset Shoe Factory started up. *August*. Peter H. Corr, Taunton, purchased Somerset Co-operative Foundry.—Mount Hope Iron Works shut down indefinitely. *September*. Somerset Co-operative Foundry sold for second time to William P. Hood.—Somerset Co-operative Foundry incorporated; capital stock, \$12,500.—During month Mount Hope Iron Works, Wilson Lace Clasp Co., and the creosote works started up. *October*. Mount Hope Iron Works shut down on account of shortage of coal. *November*. New machinery added to Wilson Lace Clasp Co. *December*. Mount Hope Iron Works started up.—Somerset Co-operative Foundry shut down for two weeks.

**Somerville.** In February, explosion and fire damaged dye-house of Barrett Bros. *October*. New addition built by Somerville Desk Co.

**Southbridge.** In April, alterations and improvements made in print works of Hamilton Woollen Co.—Sanders & Co. retired from business. *August*. Southbridge Printing Co. started up after shutdown of ten days for repairs.—Fire slightly damaged waste house of Central Mills Co., cotton. *September*. Part of machinery in print works of Hamilton Woollen Co. shut down for needed repairs. *November*. New steam boiler added to Central Mills Co.'s plant. *December*. W. W. Wells and Louis Giroux formed partnership for manufacture of lenses.

**South Hadley.** In June, an addition 80 x 63 feet made to paper mill of B. F. Perkins & Son, and new 66-inch sizing machine put in. Style of firm changed; to be known as Stony Brook Paper Co.—Fire damaged spinning room of Glasgow Mills. *August*. All mills shut down for a day on account of low water. *December*. Carew Paper Mill shut down on account of anchor ice.

**Southwick.** In July, repairs and alterations made in the saw and grist mill owned by William & John R. Boyle.

**Spencer.** In January, Spencer Gas Works destroyed by fire. *April*. Isaac Prouty & Co., shoes, shut down for few days. *July*. Four woollen mills shut down two days in week. *September*. Machinery added to shoddy mill of J. T. Aldrich.—Woollen mills of George

P. Ladd & Co. started up on full time. *October.* Work suspended in boot department of I. Prouty & Co., boots and shoes: dull trade. — Dusten & Clark, machinists, dissolved; W. T. Clark & Sons, new firm, continued. *November.* Westville Woollen Mill started up. — Bacon, Young, & Co., shoes, shut down for repairs on engine and boiler. — Capen's ice house damaged by fire.

**Springfield.** In January, J. W. Foster purchased the spooler business of Fall River Machine Co.; removed to this city, and organized stock company known as Foster Machine Co. — Hampden Narrow Fabric Co. started up after three weeks' vacation. *March.* Bay State Corset Co. moved manufacturing business from West Brookfield to this city. — Milton Bradley Co., toys and games, paid to employes the fourth annual profit-sharing dividend of two per cent on all earnings. — Charles D. Leet, first successful manufacturer of metallic cartridges, died, aged 67 years. *April.* Foster Machine Co. set up, for manufacturing concern in Fall River, a 69-drum winder, being interesting as an achievement of new local industry as well as an improvement in mechanical methods. Chief utility of winder lay in fact that yarn or thread if wound was all spooled on hollow cones or cylinders, doing away with expense and delay incidental to use of bobbins and loss on freightage through them. The tension claimed to be exactly even. The guide carrying the thread runs in a channel cut in a steel cylinder; two of these cuts begin on the cylinder near its outer edge opposite to each other, converging until they cross half way round, and from that point diverging to the point started from. As this cylinder revolves the guide is carried from one end of the paper tube to the other, winding criss-cross with absolute regularity. It can also wind from skeins, bobbins, and mule spindles at the same time. *May.* New four story building of Newell Bros. Manufacturing Co., buttons, connected with present shop by wing 30 x 40 feet. — Chapman Valve Manufacturing Co. completed addition to plant. — Springfield Iron Works added new machinery, including riveting machine, punch, and lathe. — Site bought for erection of Warwick Cycle Co.'s new factory; building to be of brick 340 x 50 feet, three stories high, with capacity for 10,000 machines a year. — Atlas Pulp Co. removed plant to a point some 20 miles from this city; its output to be increased to 25 tons per day. *July.* Gottlieb Baer, cigars, rented part of new Porter-McElwain block and removed factory. — Electricon Manufacturing Co. removed from Brooklyn, N. Y., to this city. — Metallic Drawing Roll Co. introduced its invention for cotton machinery, consisting of a fluted steel roll, intended to take place of leather covered top roll. *August.* Fire damaged mill of Springfield Waste Co. *September.* New machinery received by Electricon Manufacturing Co. and 40 men employed. Lower floor of factory devoted to machine work, second to assembling and testing, and top story to winding; company manufactures electric motors and dynamos. — Foster Machine Co. decided to remove plant to Westfield; erection of building begun. — George A. Schatney moved to new woodworking factory; about 115 men employed. *October.* O. W. Bullock & Co., watch-tool makers, rented lower floor of building formerly occupied by Springfield Woodworking Co. — Fire totally destroyed building occupied by New England Card and Paper Co. — Main brick building of Hampden Paint and Chemical Co. totally destroyed by fire. *November.* Fire destroyed cotton waste and paper stock establishment of A. N. Mayo & Co. — Charles Fuller, of the firm of Towne, Fuller, & Co., cigars, died, aged 51 years. *December.* Control of Springfield Foundry Co., castings and elevators, secured by H. K. Baker and David Hale. — Crescent Manufacturing Co. organized for manufacture of handles and mountings for funeral caskets.

**Sterling.** In May, Sterling Emery Wheel Co. resumed operations at factory in West Sterling, and filled orders from there until new factory in Ohio was completed.

**Stockbridge.** In September, M. S. Herman of New York, purchased Glendale Woollen Mills. *October.* Fire totally destroyed Glendale Woollen Mills which had just started up; works to be rebuilt and run on union cloth.

**Stoneham.** In March, P. Cogan & Son, shoes, completed addition to factory, 110 x 55 feet. *April.* Daniel Corcoran and Thomas Kenney formed copartnership and leased quarters for manufacture of shoes. *May.* Hamilton Hay introduced lasting machines at his shoe factory. *June.* Luther Martin and J. Maxwell formed copartnership for manufacture of shoes. — American Boot & Shoe Co. retired from business. *October.* Smith & Baker, shoes, of Leominster bought factory of American Boot & Shoe Co. in this town and moved here. — W. H. Farnham, lasts, formed a copartnership with George W. Badger and removed to Malden; business done under the name of Boston Last Co. *November.* Sanborn & Mann, shoes, dissolved; business continued by A. E. Mann under the style of A. E. Mann & Co. — E. F. Sanborn & Co. organized for manufacture of women's shoes. — Fire partially destroyed shoe stock factory of E. A. Newhall. *December.* Improvements made by Hamilton Hay to shoe fac-

tory. — E. L. Patch Manufacturing Co. added new building, new engine and boiler, and increased capacity. — Middlesex Boot & Shoe Co. suspended operations.

**Stoughton.** In January, Stoughton Hosiery Co. organized. *April.* New factory of Stoughton Hosiery Co. started up. — Knitting mill of French & Ward enlarged and machinery added for manufacture of worsted stockinets. *June.* Stoughton Hosiery Co. shut down and enterprise abandoned. *October.* New shoe factory built by Upham Bros. & Co. *November.* Upham shoe factory purchased by Stratton Bros., of Canton, who removed their knitting plant to this place.

**Sutton.** In May, Sutton Manufacturing Co.'s cotton mills partially destroyed by fire. *October.* Part of Sutton Manufacturing Co.'s mills shut down and new boilers and other improvements added. *November.* Repairs at Sutton Manufacturing Co. completed and mills started up.

**Taunton.** In January, Weir Stove Co. started up after week's shutdown for repairs. — Work at new Cohannet Mill No. 3 begun. *February.* Potter Yarn Mill shut down indefinitely. — Leonard Co-operative Foundry Co. suspended operations; plant purchased by New England Stove Co. which will continue the business. — The following establishments were run overtime during month: Dighton Rock Pants Co., Taunton Locomotive Works, Canoe River Mills, and Reed, Barton, & Co., electroplaters. *March.* Taunton Wire Nail Co. which had been shut down two weeks moved machinery to the Babbitt machine shop and resumed work. — Mason Machine Works added new machinery to plant. *April.* D. D. White Shoe Factory Corporation organized. — Nemasket Mills Corporation organized with capital stock of \$300,000 to build new mill for manufacture of yarn. — New addition begun on factory of Weir Stove Co., 110 x 60 feet. *May.* Work of clearing ground of Old Colony Iron Co.'s works at East Taunton begun, upon which site new mill for Nemasket Mills Corporation to be erected. — Business suspended at the Potter Yarn Mills and factory closed under then existing management. — Taunton Tack Co. and Albert Field Tack Co. absorbed by Atlas Tack Corporation. *June.* Weir Stove Co. shut down two weeks for repairs and improvements. — Corner stone of the Nemasket Mill laid. — Taunton Iron Works closed for two weeks. *July.* Potter Yarn Mill sold to Franklin Savings Bank, Boston. — West Silver Works shut down for two weeks. — New time schedule adopted by Taunton Locomotive Works. Work to begin at 6.45 A. M. with half an hour for dinner; on Saturday works shut down at noon for the day. — West Silver Works and Reed, Barton, & Co. started up after two weeks' shutdown. — Weir Stove Co. resumed operations. *August.* Somerset Co-operative Foundry of Somerset purchased by Peter H. Corr of Taunton. — Mason Machine Works ran only four days per week owing to dull trade. *September.* Taunton Copper Manufacturing Co. ran overtime to fill orders. *October.* Shoe factory of Emery & Holmes shut down preparatory to moving business to Haverhill. — New machinery put into factory of S. A. Dudley, shuttles, who occupied plant formerly used by Williams Manufacturing Co. *November.* Cohannet Mill No. 3 started up after three days' shutdown to repair engine. *December.* S. A. Wilde Manufacturing Co., Morse Twist Drill Co., and Reed, Barton, & Co. shut down to take account of stock. — Taunton Iron Works shut down for two weeks. — Machinery of Potter Yarn Mill sold to Southern parties. — Eagle Cotton Mill and D. A. Trefethen's brass foundry damaged by fire.

**Templeton.** In May, Otter River Woollen Co. made addition 90 x 70 feet to weaving department for accommodation of 50 new looms. — Improvements made at the Winchester box shop at Baldwinville. *June.* Whitney Manufacturing Co. of South Royalston, hired, for short periods, the River Mills at Otter River for tarding and spinning cotton for their other mills. *July.* Addition made to chair factory of Smith, Day, & Co., Baldwinville, 25 x 41 feet, three stories high.

**Townsend.** In February, A. Prince & Co., of Fitzwilliam, N. H., purchased mill property of Joseph Thompson at West Townsend for manufacture of patent egg-packing boxes. *March.* The U. S. Adams Mill shut down on account of high water. *July.* Improvements made at the leather-board mill of Spaulding Bros.

**Uxbridge.** In July, Rivulet Mill shut down to set up new boiler and engine. *September.* Three new fulling mills put in woollen mill of C. C. Capron. *October.* Hecla Mills shut down for repairs. *December.* Albert Davis and others bought property at South Uxbridge for erection of new woollen mill.

**Wales.** In February, Valley Mill started up to run out stock on hand belonging to Baker Bros. *July.* Fire damaged picker room of Dell Mill operated by Excelsior Woollen Co.; mill shut down to make repairs and prepare new stock. *December.* Additions made to machinery of Berkeley Mill.

**Walpole.** In January, dye-house of S. Gray & Co. damaged by fire; no delay caused at works. *February.* Stephen Pember, of Union Carpet Lining Co., died. *July.* F. Barlow, of Boston, purchased Union Mills; refitted them with machinery to manufacture cotton batting. *September.* Sheldon Bros., shoes, of Natick, moved here. — Barlow's cotton batting mill, just started, destroyed by fire. *October.* F. W. Bird & Son, paper, added new pulp draining house to plant. *December.* Buildings on Tilton Privilege purchased by G. A. Plympton of New York, overhauled and put in working shape; privilege had been idle 16 years. — Lewis Batting Mills shut down for one week to make repairs on engine and boiler.

**Waltham.** In February, Waltham Emery Wheel Co. erected a new factory; main building 240 x 50 feet, part of which is one story high and the rest two stories, with boiler and engine rooms 18 x 32 feet each, and office 30 x 40 feet. — Waltham Screw Co. organized with a capital stock of \$25,000. *June.* Zenas Carpenter, manufacturer of crayons, died, aged 68 years. — American Waltham Watch Co. shut down for three weeks' annual vacation. *November.* American Watch Tool Co. adopted nine hours as regular working day. — Waltham Electric Light Co. incorporated; capital stock \$20,000.

**Ware.** In August, two picker rooms added to Otis Co.'s plant. *September.* George H. Gilbert Manufacturing Co. started mill on winter schedule. *November.* Otis Co.'s new mill shut down to adjust shaftings and make ready to run mill by water power; two new water wheels added. — Geo. H. Coney sold business to Ware Lumber Co. *December.* New box shop for Ware Lumber Co. built to give employment to 15 or more men.

**Wareham.** In January, Standard Horseshoe Co. incorporated; capital stock \$100,000; new iron mill built for the company at South Wareham. *May.* William G. Loring, harness manufacturer, died.

**Warren.** In May, West Warren Cotton Mills began to start work at 6.30 A.M. to allow for Saturday half holiday. *June.* New boiler house added to Knowles Steam Pump Co.'s plant; two new boilers placed in position and work on iron foundry extension, 40 x 75 feet, begun. *October.* An addition built to carpet factory of Burt Bros. for a finishing room.

**Watertown.** In September, fire destroyed building occupied by Government Waterproof Paint Co.; Campbell Electric Supply Co., insulated copper wire; and John Ralston, tent cloth and window shades. *November.* Watertown Paper Mill shut down for two weeks during which time important changes were made. *December.* Shelley Manufacturing Co. organized for manufacture of Astrakhan cloth; and occupied old factory of Hale Rubber Co. — J. Q. A. Pierce of Pierce & Son, shoes, Boston, died, aged 75 years.

**Wayland.** In May, W. & J. M. Bent, boots and shoes, shut down indefinitely. *September.* N. C. Griffin, shoes, shut down for a few days. *October.* Bent Bros. & Co. succeeded W. & J. M. Bent in manufacture of boys and youths' shoes. — C. W. Dean, shoes, shut down for a few days.

**Webster.** In January, H. N. Slater Manufacturing Co. made alterations in cotton mill and added five sets of cards. *August.* Rivulet Woollen Mills shut down to make repairs and improvements.

**Westborough.** In January, new firm of Birch & Dunbar finished its first piano. — Bicycle Works resumed operations after a week's shutdown. — George B. Brigham, shoes, died, aged 73 years. *April.* T. C. Rich Co. began manufacture of window blinds. — Livingstone Cycle Manufacturing Co.'s factory ran 20 hours a day to finish 1,500 machines for the market. — D. F. Newton, retired boot and shoe manufacturer, died, aged 79 years. *July.* Livingstone Cycle Manufacturing Co. shut down permanently. *November.* Gould & Walker added lastling machines to their factory.

**West Boylston.** In January, Clarendon Mills enlarged plant. *August.* West Boylston Manufacturing Co. added a 45-inch turbine wheel. *December.* Clarendon Mills started up after a long shutdown.

**West Brookfield.** In December, Joseph T. Wood Co. incorporated for manufacture of shoes; capital stock \$15,000.

**Westfield.** In January, Whip Factory buildings bought by Connecticut Valley Cigar Co. occupied by them for manufacture of cigars. *February.* Osden's Whip Factory completely destroyed by fire. — Linenoid department of Crane Bros.' paper mill partially destroyed by fire. *March.* Whip factory of John C. Schmidt & Co. totally destroyed by fire. *May.* New whip factory of Steiner & Moore nearly completed. *June.* W. Warren Thread Co. enlarged dye works. — A. C. Barnes & Co. sold whip business to Daniel F. & Eugene Doherty, who continued under name of New England Whip Co. *July.* Amos Ensign, cigar boxes, began erection of an L shaped building 96 x 60 feet and 30 feet wide. *August.* I. O. Smith Manufacturing Co. resumed work after month's vacation. *September.* Foster Machine Co. rented property for 50 years and decided to remove from Springfield; new building 150 x 50 feet begun. *November.* Foster Machine Co.'s new building roofed over. *December.* New shop of Foster Machine Co. started up on cone and tube winding machinery. — During the year American Whip Co. built two additions to plant and voted to increase capital stock to \$250,000.

**West Newbury.** In February, new machine added to Chaplin's shoe factory. *September.* L. F. Morrill & Son, shoes, began erection of factory 35 x 60 feet. — Comb manufactory of S. N. Noyes & Co. shut down for want of water. *November.* New shoe factory erected by W. B. Chaplin. — Morrill's new shoe factory completed.

**Westport.** In March, D. H. Cornell & Son built new packing house and added cutting and packing pork to their business. *May.* Fire partially destroyed picker room of Westport Manufacturing Co.

**West Stockbridge.** In July, shoddy mill of M. Truesdell's Sons shut down for two months.

**Weymouth.** In January, Albert F. Clapp, manufacturer of inner soles, died, aged 38 years. *March.* E. A. Hunt and James Torrey, shoe manufacturers, died, aged 65 and 80 years, respectively. *May.* South Weymouth Shoe Co. incorporated; capital stock \$50,000. *June.* M. C. Dizer & Co., shoes, introduced lasting machines in their factory; reduced force of lasters from 45 to 18 men. *September.* The W. H. Clapp factory at Weymouth Landing operated, for manufacture of shoes, by a syndicate of citizens; capital stock \$35,000. *October.* Frederick Cate, wrappers, moved into new factory with new machinery and increased capacity. *November.* G. E. Porter, shoes, increased facilities of factory by addition of new engines, etc. — An addition 50 x 20 feet, built to box factory of E. Sherman & Son, South Weymouth, and new engine added.

**Whitman.** In March, Park Injector Co. transferred factory from Boston to this town, on account of lack of room in old quarters; city office retained. — Commonwealth Shoe and Leather Co. fitted up new factory with 243 new machines and improved benches. *May.* Dunbar, Hobart, & Co., tacks, sold to Atlas Tack Corporation.

**Wilbraham.** In May, Woollen Mill at Glendale, which had been idle several months, started up by Frank Adams, agent.

**Williamsburg.** In August, shoddy mill of Henry L. James, employing 75 hands, shut down indefinitely.

**Winchendon.** In January, Brown Bros. began work on new pail factory 90 x 36 feet. *March.* Ozro Hancock, manufacturer of pails and tubs, died, aged 79 years. *May.* Nelson Cotton Mills, run by N. D. White & Sons, shut down indefinitely. *June.* M. E. Converse & Co., toys, began new factory building, 100 x 40 feet, four stories high. *July.* R. S. Frost & Co., woollen goods, Boston, decided to put into shape and operate Pequog Mill. *August.* A concern to be known as Century Manufacturing Co. organized to carry on wool scouring business

**Winchester.** In May, F. A. Loring and J. A. Williams formed copartnership under name of F. A. Loring & Co., for manufacture of buff leather and splits.

**Woburn.** In January, Eaton Shoe Manufacturing Co., formerly of Lynn, leased portion of Simonds factory. *March.* Freeman A. Loring of the firm of Loring & Avery, Winchester, purchased Bryant & King's factory where buff leather will be manufactured. — Theodore G. Boutelle established leather business in new factory. — Charles B. Bryant, formerly of Bryant & King, began manufacturing in Polland factory which had been refitted. — Patrick McGowan

built addition to factory. *April.* Stephen Dow & Co., leather, shut down indefinitely. *October.* T. J. Quinn, morocco, moved into factory of C. H. Drew at Stoneham. *November.* Otis & Cobb moved to White's tannery to increase facilities. — Currying shop of B. Frank Kimball & Co. destroyed by fire. — Alfred A. Dow, leather manufacturer, died, aged 50 years. — George J. Munroe, pickle manufacturer, died, aged 64 years. *December.* New tannery started by W. S. Cobb, George Beggs, and A. Moseley, to tan and finish buff and grain leather; style of firm, W. S. Cobb & Co.

**Worcester.** In January, J. E. Wesson Shoe Co. incorporated; capital stock \$48,000. — L. S. Watson Manufacturing Co. purchased stock, fixtures, and machinery of Howard Bros. and removed them to factory in Leicester. — Bay State Shoe and Leather Co. reorganized. — Abraham Fitts, hydraulic elevators, died, aged 74 years. *February.* Property of Lathe & Morse Tool Co. sold to W. F. Draper of Hopedale. — Abbott's Menthol Plaster Co. incorporated; capital stock \$35,000. *March.* Charles F. Kent, card clothing, purchased property of Wright Machine Co. — Fire partially destroyed building occupied by Hamblin & Russell Manufacturing Co., wire goods; E. J. Somers, tacks; Asa Goddard, machinist; P. Baker, lead pipe; William Leonard, currier; Mansfield & Curtis, machinists; and J. F. Fowks & Co., harnesses. *April.* Rice & Griffin Manufacturing Co. built addition, three stories, 37 x 38 feet. — Ruddy Thread Co. built three story brick shop 142 x 43 feet. — W. F. Burgess & Co., engines, etc., moved to shop formerly occupied by L. W. Pond Machine Co. — Bay State Worst Co. incorporated; capital stock \$25,400. — Fire partially destroyed Quinsigamond wire mill of Washburn & Moen Manufacturing Co. — Phillip L. Moen, president of Washburn & Moen Manufacturing Co., died, aged 62 years. *May.* Howard Bros.' Manufacturing Co., machine card clothing, increased capacity of factory by introduction of new machinery. — E. & J. W. Lathrop decided to build needle factory 108 x 25 feet. — M. J. Whittall purchased Brussels carpet plant of Bromley Bros. of Philadelphia. — Humphrey Paper Box Co. incorporated; capital stock \$15,000. — Lugin Door Co. incorporated for manufacture of flexible doors; capital stock \$50,000. — Fire partially destroyed building occupied by Samuel Mawhinney & Co., lasts; Litchfield & Howe, machinists; Leonard L. Pollard, models; and John E. Lawton, boot and shoe patterns. *June.* Iver Johnson & Co., firearms and bicycles, purchased plant of Walter Heywood Chair Co., Fitchburg, where they moved their business. — W. H. Warren, machinists' work, sold plant to J. A. Calvin. — Norton Emery Wheel Co. at Barber's Crossing built two-story addition 24½ x 111½ feet. — On account of dullness in trade, employees of Knowles Loom Works worked on eight-hour time. *July.* Hutchins Machine Co. organized with capital stock of \$25,000 succeeding to business of Worcester Elevator Co. — M. J. Whittall Carpet Co. added new looms to plant. — Frederick Jefts & Son purchased right to manufacture, in this State, Lugin flexible doors, shutters, and curtains. — J. C. Speirs & Co., drop forgings, increased facilities by addition of new building. — Washburn Car Wheel Co. which had been shut down for repairs started up. *August.* Charles H. White, toy tables, built addition to plant. — Washburn & Moen Manufacturing Co. began construction of dam 175 feet in length and 11½ feet thick. — Charles F. Kent, card clothing, moved business to new factory purchased of Wright Machine Co.; building four stories high, 80 x 40 feet; a new boiler house 30 x 24 feet, a 60 horse power boiler, and a 35 horse power engine added. — Stock, machinery, etc., of E. W. Vail Chair Manufacturing Co. sold at auction. — Fire damaged window sash factory of C. H. Baker & Co. — F. E. Reed & Co., machinists' tools, shut down for ten days' vacation. — Fire damaged ice house of Mansfield & Dearborn. *September.* Morgan Construction Co. incorporated with capital stock of \$10,000 for construction of plants for wire manufacturing. — On account of dullness in trade eight-hour time inaugurated at works of Worcester Screw Co. *October.* Howard Bros. Manufacturing Co. increased capacity of works nearly one-half. — New stock company organized for manufacturing improved dry and oiler plates; company purchased plant formerly owned by Phoenix Plate Co. and organized under name of American Dry Plate Co. — F. I. Robbins built a three-story brick addition to machine shop, 30 x 12 feet. — Blake, Boutwell, & Co. dissolved; business continued by George F. Blake, Jr. — Knowles Loom Works started up on full time and will run thus through the winter. — George S. Barton, treasurer Rice, Barton, & Fales Machine & Iron Co., died, aged 66 years. *November.* Aetna Knitting Co. successors to Holland Hosiery Co., absorbed Park Hosiery Co. and business of Holden & Foss; also enlarged knitting plant. — George M. Rice Steel & Iron Co. organized from defunct Worcester Steel Co. — Howe & Littlefield, boot and shoe trees, succeeded to business of E. L. Shumway. — New two story factory building 200 x 60 feet added to Whittall Carpet Works, accommodating 40 additional looms. *December.* H. M. Witter & Co.'s mill, running on nine-hour time all summer, began working overtime. — C. W. Humphrey, boxes, sold to Bay State Paper Box Co., who assume possession January 1, 1892. — Manning Dye Works closed and buildings remodelled into tenements.

**THE STATE.** It has been necessary for the Bureau, in its collection of industrial statistics, to obtain all available information relating to the establishment of new enterprises, changes in existing establishments, and such other facts as are contained in the foregoing Industrial Chronology.

It will be understood that the preparation of the Chronology is only incidental to the regular work of the Bureau, undertaken mainly that its files may be kept in proper condition. Such data, if collected continuously, has some historical value, and for that reason its publication in condensed form was begun in the Report for 1890. The information has been obtained from various sources, and while every effort has been made to avoid error it is possible that some inaccuracies may appear, as our facilities have not enabled us to verify all the facts reported.

This year, instead of following the monthly classification which was used in the Report for 1890, the material has been classified by towns as well as by months in order that the Chronology might gain in local interest. It is not pretended that the information is exhaustive although it is believed to include the more important operations which have taken place during the year

From the information contained in this Chronology for 1891, we are enabled to present the leading events for the State, during the year, in detail. Returns are made from 173 cities and towns and the summarization of results, as shown in the following table, is placed in comparison with the items contained in the Industrial Chronology for 1890.

It is not to be understood that fires, shutdowns, new firms, etc., have increased or decreased in 1891 as compared with 1890, because the figures in the column for the first named year are higher or lower than those in the latter. It simply indicates that our sources of information have been enlarged and we have obtained more returns during 1891 and the figures are shown in comparison for that reason solely.

CLASSIFICATION OF CHANGES, REMOVALS, SUSPENSIONS, FIRES, ETC.	NUMBER OF ESTABLISHMENTS REPORTING SPECIFIED CHANGES, REMOVALS, SUSPENSIONS, FIRES, ETC.	
	1890	1891
Firms and industries new to towns, . . . . .	30	94
Establishments new to towns, . . . . .	10	20
Buildings constructed during the year, . . . . .	32	100
Machinery added to plant, . . . . .	-	72
Other additions to plant, . . . . .	73	210
Additions of new class of product to manufacture, . . . . .	-	20
New industrial corporations organized, . . . . .	19	76
Rebuilding of burned factories, etc., . . . . .	9	22
Removals to larger quarters, . . . . .	-	48
Resumption of business after protracted shutdowns, . . . . .	35	18
Use of important new inventions, . . . . .	4	10
Changes from private firm to corporation, . . . . .	4	22
Changes in firms, firm names, etc., . . . . .	6	68

CLASSIFICATION OF CHANGES, REMOVALS, SUSPENSIONS, FIRES, ETC.	NUMBER OF ESTABLISHMENTS REPORTING SPECI- FIED CHANGES, REMOVALS, SUS- PENSIONS, FIRES, ETC.	
	1890	1891
Changes in character of product, . . . . .	3	6
Changes in character of machinery, . . . . .	13	11
Changes from hand to machine lasting in Boots and Shoes, . . . . .	-	5
Consolidations of firms, . . . . .	21	2
Increases in capital stock, . . . . .	5	7
Removals of firms and industries to Massachusetts from other States, . . . . .	3	15
Removals of firms and industries from Massachusetts to other States, . . . . .	8	10
Reduction in number of employés, . . . . .	-	1
Increases in number of employés, . . . . .	-	5
Suspensions for vacations and brief stoppages, . . . . .	73	174
Suspensions indefinite as to duration, . . . . .	31	31
Suspensions for curtailment of production, . . . . .	91	7
Suspensions on account of low water, . . . . .	-	29
Suspensions on account of dull trade, . . . . .	-	21
Suspensions on account of strikes and lockouts, . . . . .	-	8
Suspensions on account of accidents to machinery, . . . . .	2	20
Suspensions for repairs and improvements, . . . . .	29	72
Suspensions on account of shortage of raw materials, . . . . .	5	2
Suspensions on account of litigation, . . . . .	1	-
Suspensions (permanent), . . . . .	10	20
Retirement from business (no successors), . . . . .	-	11
Dissolution of corporations, . . . . .	3	3
Auction sales of industries or plants, . . . . .	11	7
Sales of plants in whole or in part, . . . . .	16	79
Sales of plants to syndicates or trusts, . . . . .	7	8
Fires during year, . . . . .	-	214
Deaths of manufacturers, . . . . .	-	82
Purchase of beds in hospitals by corporations for injured employés, . . . . .	6	-

A few examples as to the method of reading this table will be sufficient. In 1891, there were 94 instances of firms or industries being established which were new to the towns from which the reports were received. The third line shows that, so far as reported, there were 100 new buildings erected in 1891 for manufacturing purposes; this does not include the construction of new wings, boiler houses, or similar additions to factories already built; items of this nature are included in the fifth line, "Other additions to plant." In the thirteenth line, "Changes in firms, firm names, etc.," is indicated the number of reported changes in copartnership, the taking in of new partners, the dropping out of old partners, and changes in style of firm names. Permanent dissolutions of firms, etc., are recorded in the lines "Suspensions (permanent)," "Retirement from business (no successors)," and "Dissolution of corporations."

In the following table, we present, by months, the suspensions as recorded in the preceding table, for the year 1891:



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MONTHS.	CAUSES OF SUSPENSIONS						Totals
	Vaca- tions	Indefi- nite; Strikes	Ac- cidents; Low Water	Repairs and Improve- ments	Curtail- ment; Dull Trade; Shortage of Materials	Per- manent; Retire- ment; Dissolu- tions	
January, . . . . .	9	1	2	8	1	5	26
February, . . . . .	1	8	4	2	1	3	19
March, . . . . .	18	1	1	9	1	—	30
April, . . . . .	3	3	1	3	3	4	17
May, . . . . .	3	4	1	2	1	—	11
June, . . . . .	9	6	2	6	3	3	29
July, . . . . .	74	4	2	16	5	3	104
August, . . . . .	8	6	6	4	6	5	35
September, . . . . .	8	2	3	3	1	—	17
October, . . . . .	8	1	13	13	4	2	41
November, . . . . .	10	1	6	4	1	4	26
December, . . . . .	23	2	8	2	3	5	43
TOTALS, . . . . .	174	39	49	72	30	34	398

Certain condensations have necessarily been made in the second, third, fifth, and sixth columns in the above table, in order to keep the presentation within proper limits. In the second column the indefinite suspensions and those caused by strikes and lockouts have been consolidated; the latter occurred in the following months: in February, 2; March, 1; April, 1; May, 1; June, 1; and July, 2. In the third column are combined suspensions on account of accidents to machinery and those caused by low water; the latter affected establishments in the following months: August, 6; September, 1; October, 11; November, 5; and December, 6. In the fifth column are included suspensions caused by curtailment of production, dull trade, and shortage of raw materials; curtailment of production was made by one establishment each in February, March, May, and December, and by three in August; shortage of raw materials occurred in one establishment in January and one in October. In the sixth column are included all the total shutdowns and suspensions, as follows: Permanent — January, 5; February, 2; June, 2; July, 2; August, 2; October, 1; November, 4; and December, 2. Retirement (no successors): April, 3; June, 1; July, 1; August, 2; October, 1; and December, 3. Dissolutions: February, 1; April, 1; and August, 1.

The 214 fires which are reported as having occurred during the year 1891 were distributed through the following months:

MONTHS.	Number of Fires	MONTHS.	Number of Fires
January, . . . . .	20	July, . . . . .	19
February, . . . . .	22	August, . . . . .	19
March, . . . . .	22	September, . . . . .	10
April, . . . . .	23	October, . . . . .	11
May, . . . . .	17	November, . . . . .	25
June, . . . . .	13	December, . . . . .	13



